

# The Mining Journal

## RAILWAY AND COMMERCIAL GAZETTE.

FORMING A COMPLETE RECORD OF THE PROCEEDINGS OF ALL PUBLIC COMPANIES.

No. 1493.—VOL. XXXIV.

London, Saturday, April 2, 1864.

STAMPED.....SIXPENCE.  
UNSTAMPED..FIVEPENCE.

**M R. JAMES CROFTS, SHAREBROKER,**  
No. 1, FINCH LANE, CORNHILL.

Mr. Crofts transacts business, in the way of PURCHASE or SALE, in every description of stocks, but particularly in BRITISH MINES, in no case departing from the position of a broker, at net prices. All orders meet with the utmost punctuality and zeal, and advice given as to the nature and eligibility of INVESTMENTS, when required, EXCHANGES OF STOCK effected on the most advantageous basis, subject only to one

commission.

Mr. Crofts, from a lengthened experience of the Mining Market, is competent to advise as to the merits of any mine, and the desirability of buying, selling, or exchanging shares. To the latter department he devotes particular attention.

BUSINESS in North Chiverton, Chiverton, Bedf.-Aur., Central Minera, Brynford Hall, and Great South Chiverton. BUYER of Okel Tor.

\* \* \* BEDF.-AUR.—Agent writes:—"This mine is sure to pay well in a short time."

**M R. JAMES LANE, No. 44, THREADNEEDLE STREET, LONDON, E.C.**

JAMES LANE has FOR SALE at nett prices:—20 Buller and Bassett, 40 Dale, 12s. 6d.; 50 Crebster, 45s.; 50 East Jane, 45s.; 20 East Carn Brea, 12s. 6d.; 20 East Lovell; 25 East Russell, 24½; 20 East Seton, 5s. 6d.; 20 East Treskerby, 25 Great Wheal Busy, 24½; 5 Grampian and St. Aubyn, 29½; 5 Great Wheal Fortune, 24½; 20 Kelly Bray, 24½; 50 Molland, 3s.; 5 Nanglles, 23s.; 60 Marazion, 2s.; 20 New Birch Tor and Vitifer, £2; 60 New Wheal Rose, 15s. 6d.; 20 North Treskerby, 23s.; 3 South Frances, £2; 50 St. Just Consols (fully paid); 50 St. North Treskerby, 23s.; 3 South Frances, £2; 50 St. Just Consols (fully paid); 50 St. Day United, 3s.; 3 Trelawny, £25; 35 Wheal Hennie, 4s.; 5 Wheal Buller, £21; 5 Vigras and Clogau, £2; 50 Vale of Towy, 6s. 6d.; 100 Worthing, 16s. 6d.

**PETER WATSON'S WEEKLY MINING CIRCULAR AND SHARE LIST**, published every Friday, price 6d. each copy, forwarded on application. This Circular contains weekly important information with respect to all the principal dividend and progressive mines in Devon and Cornwall.

79, Old Broad-street, London, E.C.

**STOCK AND SHAREDEALER.—MR. PETER WATSON, ENGLISH AND FOREIGN STOCK, SHARE, AND MINING OFFICES, 79, OLD BROAD-STREET, LONDON, E.C.**

TELEGRAPHIC MESSAGES TO BUY OR SELL Railway, Bank, Mine, and other shares and stocks, punctually attended to on commission, or at nett prices for cash, or for fortnightly settlements, with advice as to purchases or sales.

Nineteen years' experience.

(Two in Cornwall and Seventeen in London.)

Bankers: Union Bank of London, and the Alliance Bank of London and Liverpool.

Every information can be obtained on personal application or by letter, as to purchases and sales of mine and other shares, and the best investment for capital.

From the close proximity of his Offices to the Stock Exchange, as well as the Mining Exchange, PETER WATSON is enabled to act with promptness on all orders entrusted to him, which at all times are carried out with punctuality, and to the best advantage of his clients.—April 1, 1864.

**M R. LELEAN, STOCK AND SHAREDEALER, 11, ROYAL EXCHANGE, LONDON, E.C.**

Shares bought and sold on the usual commission. Telegraphic messages promptly attended to. Mines inspected, and reliable information given. Established 15 years.

FOR SALE.—50 Brittany Silver-Lead shares, at 37s. 6d.

Bankers: Roberts, Lubbock, and Co.

**M R. E. GOMPERS, MINING OFFICES, 5, CROWN CHAMBERS, THREADNEEDLE STREET, LONDON, E.C.**

BUSINESS TRANSACTED IN BRITISH AND FOREIGN STOCKS AND SHARES.

Terms, 1½ per cent.

Bankers: London and Westminster Bank.

**M R. H. WADDINGTON, MINING AND SHAREBROKER, 26, THROGMORTON STREET, LONDON, E.C.**

Shares in railways, mines, &c., bought and sold on the usual commission.

**T H O M A S H A M I L T O N (late of Truro), STOCK AND SHAREBROKER, 4, AUSTINFIARS, OLD BROAD STREET, LONDON, E.C.**

Mine shares bought and sold on the usual commission.

**M R. WILLIAM WARD (late with Messrs. Dunsford and Ranken), SHAREBROKER, 29, THREADNEEDLE STREET, LONDON, E.C.**

RELIABLE INFORMATION respecting mining operations may be had by applying as above.

**W H I L M A N S E W A R D, MINING BROKER, STOCK AND SHAREDEALER, 19, THROGMORTON STREET, LONDON, E.C.**

Commission, 1½ per cent. on all transactions.

**M R. THOS. THOMPSON, MINING OFFICES, 12, OLD JEWRY CHAMBERS, LONDON, E.C.**

**W H I L M A N S E W A R D, MINING BROKER, 29, AUSTINFIARS, LONDON, E.C.**

Orders to buy or sell, accompanied by references, punctually attended to.

**G E O R G E RICE, SHAREBROKER, 5, COWPER'S COURT, BIRCHIN LANE, LONDON, (21 years' experience), has SPECIAL BUSINESS, as BUYER or SELLER, for cash or account, in the following mines:—**

Closing quotations.

Chiverton ..... £12 - 12½

Clifford Amalgamated ... 36 - 36½

Devon & Bedford (Cochiar) 12s. 6d. prem.

East Lovell ..... 11s. 6d. - 11½

East Rosewarne ..... 2½ - 2½

East Caron ..... 31s. 6d. - 32½

East Russell ..... 4½ - 4½

West Carn Brea ..... 7½ - 7½

Great Wheal Vor ..... 37½ - 37½

Hington Down ..... 4 - 4½

Mark Valley ..... 6 - 6½

New Rosewarne ..... 11s. 6d. - 12½

For all shares bought by GEORGE RICE, he will give cash on receipt of transfer.

Great Wheal Vor, Chiverton, East Lovell, East Caron, Wheal Crebster, and Wheal Grenville.—Enormous losses or gains (the result of market operations) will be made in dealing in these shares during the ensuing month. Speculators and shareholders can learn from GEORGE RICE the chances they have of winning or losing. GEORGE RICE does not publish his opinions, and is, therefore, not only competent, but free to give honest and sound advice.

GEORGE RICE, SHAREBROKER, 5, COWPER'S COURT, BIRCHIN LANE, LONDON, (21 years' experience), has SPECIAL BUSINESS, as BUYER or SELLER, for cash or account, in the following mines:—

Closing quotations.

Chiverton ..... £12 - 12½

Clifford Amalgamated ... 36 - 36½

Devon & Bedford (Cochiar) 12s. 6d. prem.

East Lovell ..... 11s. 6d. - 11½

East Rosewarne ..... 2½ - 2½

East Caron ..... 31s. 6d. - 32½

East Russell ..... 4½ - 4½

West Carn Brea ..... 7½ - 7½

Great Wheal Vor ..... 37½ - 37½

Hington Down ..... 4 - 4½

Mark Valley ..... 6 - 6½

New Rosewarne ..... 11s. 6d. - 12½

For all shares bought by GEORGE RICE, he will give cash on receipt of transfer.

Great Wheal Vor, Chiverton, East Lovell, East Caron, Wheal Crebster, and Wheal Grenville.—Enormous losses or gains (the result of market operations) will be made in dealing in these shares during the ensuing month. Speculators and shareholders can learn from GEORGE RICE the chances they have of winning or losing. GEORGE RICE does not publish his opinions, and is, therefore, not only competent, but free to give honest and sound advice.

GEORGE RICE, SHAREBROKER, 5, COWPER'S COURT, BIRCHIN LANE, LONDON, (21 years' experience), has SPECIAL BUSINESS, as BUYER or SELLER, for cash or account, in the following mines:—

Closing quotations.

Chiverton ..... £12 - 12½

Clifford Amalgamated ... 36 - 36½

Devon & Bedford (Cochiar) 12s. 6d. prem.

East Lovell ..... 11s. 6d. - 11½

East Rosewarne ..... 2½ - 2½

East Caron ..... 31s. 6d. - 32½

East Russell ..... 4½ - 4½

West Carn Brea ..... 7½ - 7½

Great Wheal Vor ..... 37½ - 37½

Hington Down ..... 4 - 4½

Mark Valley ..... 6 - 6½

New Rosewarne ..... 11s. 6d. - 12½

For all shares bought by GEORGE RICE, he will give cash on receipt of transfer.

Great Wheal Vor, Chiverton, East Lovell, East Caron, Wheal Crebster, and Wheal Grenville.—Enormous losses or gains (the result of market operations) will be made in dealing in these shares during the ensuing month. Speculators and shareholders can learn from GEORGE RICE the chances they have of winning or losing. GEORGE RICE does not publish his opinions, and is, therefore, not only competent, but free to give honest and sound advice.

GEORGE RICE, SHAREBROKER, 5, COWPER'S COURT, BIRCHIN LANE, LONDON, (21 years' experience), has SPECIAL BUSINESS, as BUYER or SELLER, for cash or account, in the following mines:—

Closing quotations.

Chiverton ..... £12 - 12½

Clifford Amalgamated ... 36 - 36½

Devon & Bedford (Cochiar) 12s. 6d. prem.

East Lovell ..... 11s. 6d. - 11½

East Rosewarne ..... 2½ - 2½

East Caron ..... 31s. 6d. - 32½

East Russell ..... 4½ - 4½

West Carn Brea ..... 7½ - 7½

Great Wheal Vor ..... 37½ - 37½

Hington Down ..... 4 - 4½

Mark Valley ..... 6 - 6½

New Rosewarne ..... 11s. 6d. - 12½

For all shares bought by GEORGE RICE, he will give cash on receipt of transfer.

Great Wheal Vor, Chiverton, East Lovell, East Caron, Wheal Crebster, and Wheal Grenville.—Enormous losses or gains (the result of market operations) will be made in dealing in these shares during the ensuing month. Speculators and shareholders can learn from GEORGE RICE the chances they have of winning or losing. GEORGE RICE does not publish his opinions, and is, therefore, not only competent, but free to give honest and sound advice.

GEORGE RICE, SHAREBROKER, 5, COWPER'S COURT, BIRCHIN LANE, LONDON, (21 years' experience), has SPECIAL BUSINESS, as BUYER or SELLER, for cash or account, in the following mines:—

Closing quotations.

Chiverton ..... £12 - 12½

Clifford Amalgamated ... 36 - 36½

Devon & Bedford (Cochiar) 12s. 6d. prem.

East Lovell ..... 11s. 6d. - 11½

East Rosewarne ..... 2½ - 2½

East Caron ..... 31s. 6d. - 32½

East Russell ..... 4½ - 4½

West Carn Brea ..... 7½ - 7½

Great Wheal Vor ..... 37½ - 37½

Hington Down ..... 4 - 4½

Mark Valley ..... 6 - 6½

New Rosewarne ..... 11s. 6d. - 12½

For all shares bought by GEORGE RICE, he will give cash on receipt of transfer.

Great Wheal Vor, Chiverton, East Lovell, East Caron, Wheal Crebster, and Wheal Grenville.—Enormous losses or gains (the result of market operations) will be made in dealing in these shares during the ensuing month. Speculators and shareholders can learn from GEORGE RICE the chances they have of winning or losing. GEORGE RICE does not publish his opinions, and is, therefore, not only competent, but free to give honest and sound advice.

GEORGE RICE, SHAREBROKER, 5, COWPER'S COURT, BIRCHIN LANE, LONDON, (21 years' experience), has SPECIAL BUSINESS, as BUYER or SELLER, for cash or account, in the following mines:—

Closing quotations.

Chiverton ..... £12 - 12½

Clifford Amalgamated ... 36 - 36½

Devon & Bedford (Cochiar) 12s. 6d. prem.

East Lovell ..... 11s. 6d. - 11½

## Original Correspondence.

## MINING ASSOCIATION OF CORNWALL AND DEVON.

With deference to the opinion of such an experienced miner as Captain Joseph Vivian, I think that in a recent speech of his he has mistaken the objects of the association, and has confounded the teaching of solid knowledge, indispensable in mining, with "the exposition of the general principles of mining." Men may frame an hypothesis to account for phenomena presenting themselves in its pursuit, instead of a theory founded on inferences drawn from principles established on independent evidence. He is, probably, the wisest miner who is most skilful in drawing such inferences, and the most successful is he who, with sufficient capital, and having the preference of a seat to which discoveries near it have given value (a boxing of the compass of names round the favourite), knows how to carry out such theory with practical efficiency; the result of long experience, and of availing himself of all the aids which science has liberally placed within his reach. The geometer, the natural philosopher, the engineer, and the metallurgist, are indispensable workers with or for him. Theory, not hypothesis, led a schoolmaster to point out that, except on the equator, steering due east or west is not the shortest way to a point east or west, and the like of all other directions not coincident with a great circle. It would take years longer to sink coast-pits due east or west, across the widest part of Africa or of South America, than by following a curve severally north or south of such lines. Theory shows that water, or a railway train, moving rapidly towards the north in the northern, or towards the south in the other hemisphere, must wear the eastern rail or bank most; that a room turns in 24 hours (partially according to the latitude) round a freely suspended oscillating pendulum. Adams and Le Verrier were, from the theory of gravitation, able to announce the existence and position of a large, but then unseen, planet. The construction of dioptric lenses to light our sailors at night is the perfect carrying out of a true theory. Much does navigation owe to theory in the improved forms of vessels, and to the rectification of the compass in those of iron. Agriculture is not a thing of yesterday, and yet but recently did theory conclude that an abundant supply of sugar might be obtained profitably from beet. France is now dependent on it, and, in some of our districts, farmers using the refuse have increased tenfold the number of horned cattle, and at the same time have doubled the wheat produce. Humboldt declared that diamonds could, doubtless, be found in the Ural Mountains, and other geologists that gold must be discovered in Australia, whilst one of them, Sir R. I. Murchison, pronounced on the absence of coal from vast districts of Russia, and on the conformation of the interior of South Africa before Livingston traversed it. Pattinson's beautiful mode of desilvering lead is the fruit of chemical theory. Does any miner work without a theory? Some conclude against the existence of metals in some fossiliferous rock, as in the strata north of Dartmoor, or in the 24,000 square miles of the east district of South Australia. Many expect to find more tin or copper in east and west than in north and south veins, and that the latter may produce lead, which metal they rarely seek for in granite, nor even for copper in the heart of a granite district. It is thought that some crystalline characters of that rock are unfavourable, that veins are productive near the junction of dissimilar rocks, that veins of opposite underlie, intersecting each other, are poor. Some miners deem the absence of elvan and of cross-courses to be unfavourable, and that lodes are impoverished below elvan; that the non-coincidence of the geographical and geological axes of hills is unkindly; that hot water rising out of a lode is the reverse; that a flickering light on the surface indicates the presence of metal beneath, as in North Basset, before the sinking of Grace's shaft. In the Aix-la-Chapelle district, a little flower (the *Viola calaminaris*) is supposed to flourish only on a zinc soil, and to indicate the presence of that mineral; doubtless, more certainly than the convulsive twitches of the hazel rod, of which Capt. Rickard has so clearly pointed out the cause. The theory that tin would not be found below copper has been greatly modified; and has not a more enlarged view of the subject led to the belief that at a yet greater depth another deposit of copper would be found? Theories of competent miners, founded on the data of a limited district, are often acted on, as if they had been based on principles of universal application. But, as Prof. Tyndall says—"In the study of nature two elements come into play, which belong, respectively, to the world of sense and to the world of thought. We observe a fact, and seek to refer it to its laws. We apprehend the law, and seek to make it good in fact. The one is theory, the other is experiment, which, when applied to the ordinary purposes of life, become practical science." He further says, in allusion to the discovery of the mechanical equivalent of heat, and of the mutual invertibility of heat and force, "Mayer's labours have the stamp of a profound intuition. Joule's are an experimental demonstration; the one drew large and bright conclusions from slender premises, the other aimed at the firm establishment of facts. They have thus led the way towards a right appreciation of the general energies of the universe."

If we would see theory reduced to practice, and that practice being constantly improved by inductions from experiments, we should visit some of our large mines. There are crushing-mills (instead of girls) to grind the ore; steam, and not men (taken from their regular work) to work the capstan; skips rapidly raising  $\frac{1}{2}$  ton at a time, in lieu of small kibbles; wire-ropes running over large pulleys and through a grease-box; plungers used advantageously; safety-fuses instead of straws or rushes; and in some mines 20 holes blasted simultaneously by galvanism; steel instead of iron borers; and in some foreign mines Baron Lenk's gun-cotton, with greatly lessened smoke; or jiggled by machines; round boulders; several frames managed by one girl; rotary calciners; a clear stream, water containing copper no longer running to waste; iron lifters of stamp-heads; and, lastly, the steam-engine, wayward and wasteful in its infancy, now in the self-restrained might of its manhood. How much incessant labour of innumerable minds and hands has been employed in perfecting all this plant. It did not spring out of the soil, but is the brilliant result of instruction and experience in every department of science and art. Shall we ignore this, and suppose that the thousand mining agents of Cornwall and Devon, in the next generation, will instinctively know how to estimate and employ all mechanical appliances, or to judge of the specialties of different mining districts, or must each for himself work out results already known, and with unceasing labour attain bit by bit the completeness of a judicious, skillful miner, such as Cornwall and Devon do now justly take pride in. It is self-evident that no teaching can supply the place of what must be learnt in the mine itself; but if a man have already mastered the necessary elements of his profession, whilst his mind has, at the same time, been trained to think methodically and to act vigorously, he will bring into his practical work some discrimination, fertility in resources, and a mind able to concentrate its energies, for he has not then to feel his way in the first steps of his calling. I have seen errors in these first steps cost adventurers very large sums in needless tutwork or machinery. A sea captain of long standing stands the good ship, from ignorance or neglect of some apparently small matter; so may the opening of many mines barren in results, and the stopping of others which should have been continued, be often traced to one item having been overlooked. But many illustrations could I give of this. Where there are several agents in a mine, their candid, undogmatic, and brotherly discussion on the work before them is a great check to individual mistakes; and the different talents of each compose a most efficient pare. It is, indeed, indispensable that they should be practically versed in the skilled labour of the pitman and timberman, of the tributer and tutwork man, as well as of the ore and tin-dresser; but this alone is not all: the careful storing up and arrangement of numerous observations, the power of observing differences in things that are alike, and points of agreement in those that differ, that incomparable tact and sagacity of the eye acquired underground, are the crowning qualities of the miner. Captain J. Vivian errs in supposing that the Mining Association was formed to instruct such men; it was rather that it might learn from them, and receive, discuss, and record their views and experiences, that they might not be lost to the community. Various geological, colliery, mining, and agricultural associations, and the London Society of Arts, have proved the value of such intercourse. Agriculture is of the olden time, and yet (as I have stated on a former occasion) in the district of South Hants every step of progress made in its agriculture during the last 15 years has been preceded by full and candid discussions between those actually engaged in farming. It is much beside the mark to say that the instruction of the working miners is merely theoretical; to know the unchangeable relations of space and of numbers is as real as to have learned to light a fuse; they are also eager to be taught in metallurgy and mineral chemistry; the tension of wood and iron, the properties of steam, and the elements of hydrostatics. Not an item of this knowledge is valueless to the working miner, not one which may not benefit him in his career. But

if neither we nor they were to derive pecuniary benefit from it, do we owe them nothing in their life of toil and danger? Not by removing them out of it, but by diminishing both, by widening their field of observation; that Nature in her endless variety be not as a dead world within, "a mere grovelling level of an endless occupation without purpose, and idleness without rest." Happily many of them know already that God has not heaped the rock of the mountain only for the quarry, nor clothed the grass of the field only for the oxen," and they delight in observing the works of His hands.

To improve the miners' physical condition is a special object of the association. Can we look at them, crippled by accidents, or gasping from disease of heart or lungs, with large families dependent on the father's distressful labour, without feeling that we are certainly blameable on our poor brother's account? Are they sufficiently warned or taught as to the sources of dangers or of illness? Many causes to which the grievous explosions of boilers may be owing have been brought to light, "but practical science has not determined to what extent they actually come into operation." Do we attend to the first insidious approaches of the miners' diseases, and provide for them such careful early nursing for their suffering as Thomas Robertes is now doing bountifully by the erection of a local hospital?

I can hardly conclude this long letter without saying that I differ from Capt. Vivian's view of mining on the continent of Europe. Whilst kibbles and sumps, sollers and winzes, are household words with us, we should not forget the labours of our German predecessors, from whom we derive these terms. In the Library of Munich is a book on the art of mining and its nomenclature, illustrated by woodcuts, and is one of the earlier printed books from the press of the younger Schöffer, more than 350 years ago, and before he printed Tyndal's translation of the New Testament into English. The Germans have deeper shafts and longer adits than any that we have yet attempted, and by great economy in every department, they carry on mines that would have been abandoned in England. They have had to contend with restrictive laws, with want of capital, and until recently of fuel also, and, worst of all, with the political uncertainties of revolutions, with the conscriptions, and horrors of long wars. They used the man-machine before we did, and the Hungarian method of treating gold ores has just been introduced into Wales. The great copper and iron mines of Sweden, and the silver mine of Kongsvinger, in Norway, have given proof of what a small and poor, but industrious and intelligent, population can accomplish. When on the latter mine, some 34 years ago, I judged that it might be more efficiently worked, especially by using gunpowder, but experience in different countries has taught me that no hasty survey can enable me to decide, either as to value, the method pursued there in mining, or as to the cost or speed of the tutwork. We shall certainly not improve in anything whilst we think ourselves to be perfect. C. Fox.

Bath, 29th of 3d Month, 1864.

## MANUFACTURE OF PEAT CHARCOAL.

SIR,—I am sorry to find that your Dublin correspondent, in last week's Journal, writes in such a desponding strain respecting the manufacture of peat charcoal. I can assure him that it can be carbonised, suitable for the manufacture of iron, at a small cost per ton. If he is prepared to carry out his proposal, I shall be glad to hear from him, with a view to granting the royalty of the patent under which the charcoal is made.

British Charcoal Works, York, March 30. JOHN LAWSON.

## MANUFACTURE OF PEAT CHARCOAL.

SIR,—Assuming that the proposition of Mr. John Clare, jun., to employ peat charcoal as a fuel for smelting iron be feasible, I think he would do well to pay a visit to Wyld's-rents, Long-lane, Bermondsey, and ascertain the merits of a process invented by Mr. Thomas Brooks, which, although specially intended for the manufacture of charcoal from refuse iron, would, I think, be equally valuable for the treatment of peat. Mr. Brooks's invention relates to various improvements in means or apparatus for the production of charcoal and other products from refuse tan and other woody substances, and it has for its object economy of labour, increase of quantity, improvement of quality, and safety to the persons employed. For this purpose, he considerably increases the size of the retorts, by preference to about double that ordinarily adopted, and modifies their shape so as to keep the contents in a thinner body, and thus more susceptible to the heat of the furnace employed. The following dimensions, or thereabouts, of each retort answer well—Height, 1 ft. 3 in.; breadth, 2 ft. 6 in.; length discretionary; but he does not confine himself thereto. He also places doors at each end, for the convenience of feeding, and discharges the carbonised matter by pushing it, by means of rakes, from one to the opposite end through funnels, or conductors, into coolers; and he places by preference only three of such retorts in each bed or setting, thus rendering them easier of access for charging and discharging; he also makes in each door an opening sufficient to admit a rod, poker, or rake, and capable of being closed air-tight when not in use by a valve. By means of the rod, poker, or rake, he stirs the contents of the retorts, so as to subject them more equally to the action of the heat employed. The funnels, or conductors, are applied to the ends of the retorts so as to fit them tightly, and they are adapted to conduct the matters from the retorts into receiving-box, or cooler, and so as to prevent contact of the carbonised matter with the external air, and consequent loss of quantity and injury to quality by firing or otherwise, and to protect the persons employed from injury, and the building from danger from the ignited particles. J. S.

March 28.

## EXTENDED APPLICATION OF PEAT.

SIR,—Your correspondent, "R. R.," in last week's Journal, might as well have informed himself correctly as to the process of treating peat, which he ascribes to me, before criticising it, as nothing can be much further from the reality than his description of it. I propose to make use of every part of what can be properly termed peat; I do not say that the lighter parts will produce so much fuel as the denser stratum, but they will make fuel equally good, and both sorts will be subjected to the same treatment. There is no occasion to waste any time in stacking the peat when cut, it can be taken direct from the bog to the machine, and it need not be handled until turned out in the shape required, when it will be in a state to be dried readily, and be fit for fuel, for which a very ready and economical process of conversion into coke is proposed.

The quantity to be produced is only limited by the machines employed, one of which will make 100 tons of fuel per day. The effect of peat upon iron is much better known than "R. R." supposes, and if he is careful to make use only of peat free from sulphur, he will find it not so destructive to his states; at any rate, the simplicity and solidity of my machinery will enable it to withstand the effects supposed to be produced. Iron has been smelted with peat charcoal for a considerable length of time on the Continent, and railway engines are now worked by means of fuel produced by compression. This has been found in Ireland to be too expensive, it does not extract so much water as the mode applied for condensing peat, at the same time the latter produces the heavier fuel. Horse-shoes are found to be more durable, and mining tools to retain their edge better, when forged with peat, and though these may be deemed trivial things, the principle is the same as if it were applied to the making of armour-plates. As to the heating power and durability of peat fuel, I rely on my own experiments, which I can repeat, as I shall soon be at work on a moor where facilities are given for the manufacture on a large scale, and I do not despair of convincing anyone of the importance, as well as the profit, of the manufacture. Attention should be mainly directed towards the production of fuel on a large scale, in preference to the suggested experiments for other products, which, although good in themselves, have always failed to realise the expectations of their authors, and have in more ways than one been the means of peat having been so much neglected. The money lost in such experiments on Dartmoor, some years since, is a sufficient warrant for my not wishing to follow such an example, though I do not wish to prevent others from experimenting if they think differently. I do not profess to know much of the proceedings of the Irish Peat Company, but I have always understood that there were various reasons for the failure of the scheme. I do know that large quantities of charcoal were applied for at remunerative prices, which from some cause or other could not be supplied. I should be much obliged if I could be supplied with a detailed account of the method employed by Mr. Clark, "one of the shareholders in the Irish Peat Company," in the manufacture of iron with peat charcoal. It is only by studying the failures of previous trials that we can hope to avoid similar results.

The remarks of "Carbon" in the same Journal appear to be based on the supposition that air-dried peat alone is to be used. There may, probably, be a different furnace required for peat fuel, but if it can be manufactured, as I propose, of a specific gravity nearly equal to coal, I think the difference in the furnace need not be so very great. The greatly increased

value given to iron by the use of charcoal offers us a great inducement to try to produce what is required, and if "R. R." or his friends are really in earnest on the subject, I shall be happy to communicate with him on very large capital, and I shall be happy of his assistance, if he approves of my ideas when he knows them more perfectly. JOHN PARKINSON.

32, Ironmonger-lane, London, March 30.

## NEW NORTH COUNTRY COAL FURNACE.

SIR.—Although smoke from steamships is such a recognised nuisance, I see few, if any, means taken to effectually prevent it; and, although fuel is an expensive article, I still find the apparatus for consuming it generally in a very imperfect condition. Always, in going below, a handsome, well-kept pair of engines present themselves to your gaze; but look at the boiler and the furnace fronts—they are most likely cracked, the doors in bad repair, and the fire-bars more or less out of order, and this when the furnace is an apparatus for consuming fuel every year to nearly half the value of the machinery, and should be kept up in repair as carefully as the slides of the engines themselves. I have lately seen the average calorific value of Welsh and Newcastle coal raised nearly 14 per cent., and the power of the boiler producing steam raised to the same extent, by the following simple alterations:—Reducing the length of the fire-bars so as to increase the proportion of heating surface to about 33 square feet per square foot of grate surface, and securing an efficient combustion chamber, and by adopting a large hollow furnace-door the baffle-plate alone is perforated with many 7-16th holes as practicable, the door intact, and the air coming through the bottom space only between the door and the baffle-plate. A simple shutter for this bottom space will give the means of regulating the quantity of air going through, which, however, does not seem to be greatly wanted. In a furnace so constructed the most bituminous steam coal may be burned with the greatest economy, almost entirely without smoke, by the most careless stoker, and the boiler made to produce the greatest possible amount of steam in a given time. THEO. WOOD BUNNING.

Grey-street, Newcastle-on-Tyne, March 29.

## THE DIVINING ROD.

SIR.—I observe a letter, in last week's Journal, from Mr. T. M. Pascoe, criticising my recent communication on the "divining rod." I gave the reasons why I was induced to publish that letter, and Mr. Pascoe gives full evidence that there were just grounds for the publication of so-called of the kind, for I think he has been led away by the dowsing-rod delusion further than anyone I have yet heard of. The statements I made in my letter referred to, in the Journal of March 14, are based upon facts, and there is no fear on my part of being able to maintain their truth. Having shown the error of attributing any practically attractive properties to the dowsing-rod, it is not my intention to quibble with anyone on the subject.

I wish Mr. Pascoe success in his mining, and for that reason do not disposed to critically examine his letter, but strongly recommend him to analyse it himself, and he will not fail, I think, to discover that his arguments in favour of the dowsing-rod are not what he intends (viz., some), but untenable, and that his statements generally cannot but be prejudicial to himself, and damaging to the concerns which he names.

Wenford, near Bodmin, March 29.

GEORGE RICKARD.

## GOLD IN WALES.

SIR.—In the Journal of March 19 "An Englishman in Wales" is called further attention to this interesting subject, in connection with remarks made by Mr. J. Y. Watson in his "Review of Mining for 1863" and also of a report by Mr. J. Nancarrow on the Welsh Gold Mining Company's Works at Cefncoch. "An Englishman in Wales" seems to imagine that the remarks of Mr. Watson are proved to have been quite called for by such reports as that from the Welsh Gold Mining Company, written by Mr. J. Nancarrow. The whole tenor of "An Englishman's" letter is to run down Mr. Nancarrow's report, by insinuating that it is, in other words, written on too large a scale. That may be the Englishman's opinion, and probably an Englishman's view of the case. I am myself a Welshman, and a Welshman in Wales, and, perhaps, you will be good enough to allow a Welshman's view to appear in the Journal. In this place, allow me to say that we have too many "Englishmen in Wales" of this stamp. A class of men who immediately jump into print, attempting to snub or crush any who is likely to do in Wales in gold mining what Englishmen have and are doing elsewhere in various parts of the world. I have not the honour of Mr. Nancarrow's acquaintance, but I am bound to do that gentleman the justice to say when I read his report the impression immediately arose in my mind that the coming man was one of the last. I am myself a Welshman, and a Welshman in Wales, and, perhaps, you will be good enough to allow a Welshman's view to appear in the Journal. In this place, allow me to say that we have too many "Englishmen in Wales" of this stamp. A class of men who immediately jump into print, attempting to snub or crush any who is likely to do in Wales in gold mining what Englishmen have and are doing elsewhere in various parts of the world. I have not the honour of Mr. Nancarrow's acquaintance, but I am bound to do that gentleman the justice to say when I read his report the impression immediately arose in my mind that the coming man was one of the last. I am myself a Welshman, and a Welshman in Wales, and, perhaps, you will be good enough to allow a Welshman's view to appear in the Journal. In this place, allow me to say that we have too many "Englishmen in Wales" of this stamp. A class of men who immediately jump into print, attempting to snub or crush any who is likely to do in Wales in gold mining what Englishmen have and are doing elsewhere in various parts of the world. I have not the honour of Mr. Nancarrow's acquaintance, but I am bound to do that gentleman the justice to say when I read his report the impression immediately arose in my mind that the coming man was one of the last. I am myself a Welshman, and a Welshman in Wales, and, perhaps, you will be good enough to allow a Welshman's view to appear in the Journal. In this place, allow me to say that we have too many "Englishmen in Wales" of this stamp. A class of men who immediately jump into print, attempting to snub or crush any who is likely to do in Wales in gold mining what Englishmen have and are doing elsewhere in various parts of the world. I have not the honour of Mr. Nancarrow's acquaintance, but I am bound to do that gentleman the justice to say when I read his report the impression immediately arose in my mind that the coming man was one of the last. I am myself a Welshman, and a Welshman in Wales, and, perhaps, you will be good enough to allow a Welshman's view to appear in the Journal. In this place, allow me to say that we have too many "Englishmen in Wales" of this stamp. A class of men who immediately jump into print, attempting to snub or crush any who is likely to do in Wales in gold mining what Englishmen have and are doing elsewhere in various parts of the world. I have not the honour of Mr. Nancarrow's acquaintance, but I am bound to do that gentleman the justice to say when I read his report the impression immediately arose in my mind that the coming man was one of the last. I am myself a Welshman, and a Welshman in Wales, and, perhaps, you will be good enough to allow a Welshman's view to appear in the Journal. In this place, allow me to say that we have too many "Englishmen in Wales" of this stamp. A class of men who immediately jump into print, attempting to snub or crush any who is likely to do in Wales in gold mining what Englishmen have and are doing elsewhere in various parts of the world. I have not the honour of Mr. Nancarrow's acquaintance, but I am bound to do that gentleman the justice to say when I read his report the impression immediately arose in my mind that the coming man was one of the last. I am myself a Welshman, and a Welshman in Wales, and, perhaps, you will be good enough to allow a Welshman's view to appear in the Journal. In this place, allow me to say that we have too many "Englishmen in Wales" of this stamp. A class of men who immediately jump into print, attempting to snub or crush any who is likely to do in Wales in gold mining what Englishmen have and are doing elsewhere in various parts of the world. I have not the honour of Mr. Nancarrow's acquaintance, but I am bound to do that gentleman the justice to say when I read his report the impression immediately arose in my mind that the coming man was one of the last. I am myself a Welshman, and a Welshman in Wales, and, perhaps, you will be good enough to allow a Welshman's view to appear in the Journal. In this place, allow me to say that we have too many "Englishmen in Wales" of this stamp. A class of men who immediately jump into print, attempting to snub or crush any who is likely to do in Wales in gold mining what Englishmen have and are doing elsewhere in various parts of the world. I have not the honour of Mr. Nancarrow's acquaintance, but I am bound to do that gentleman the justice to say when I read his report the impression immediately arose in my mind that the coming man was one of the last. I am myself a Welshman, and a Welshman in Wales, and, perhaps, you will be good enough to allow a Welshman's view to appear in the Journal. In this place, allow me to say that we have too many "Englishmen in Wales" of this stamp. A class of men who immediately jump into print, attempting to snub or crush any who is likely to do in Wales in gold mining what Englishmen have and are doing elsewhere in various parts of the world. I have not the honour of Mr. Nancarrow's acquaintance, but I am bound to do that gentleman the justice to say when I read his report the impression immediately arose in my mind that the coming man was one of the last. I am myself a Welshman, and a Welshman in Wales, and, perhaps, you will be good enough to allow a Welshman's view to appear in the Journal. In this place, allow me to say that we have too many "Englishmen in Wales" of this stamp. A class of men who immediately jump into print, attempting to snub or crush any who is likely to do in Wales in gold mining what Englishmen have and are doing elsewhere in various parts of the world. I have not the honour of Mr. Nancarrow's acquaintance, but I am bound to do

Chiverton Valley, 5 to 5½. The market generally is firm. There are many mines worth attention at the present time, and there are many "schemes" afoot. The investing public should seek good advice before buying.  
HENRY GOULD SHARP.  
Established eleven years.  
92, Poultry, London, C.E.

## WHEAL UNITY CONSOLS.

SIR.—Will you allow me to make a suggestion to the committee?—and it is, that a special meeting be called to forfeit absolutely all shares upon which arrears of calls are due. I was greatly astonished to learn this morning that very heavy amounts of arrears were due, and that the committee had to make advances to meet the current expenditure, which I conceive to be very injurious towards them; and as the agents are hoping to make a discovery on the silver lode cut at Wheal Hartley, within half-a-mile, of our mine, I should at once forfeit shares not paid upon; for it is rather fair nor honest that shareholders who refuse to pay their quota of costs when mines are poor should come in and derive benefit from any discovery. Let me add that forfeiture of shares does not release holders from their proportion of debts already incurred, and the committee will not be doing their duty if they do not also at once proceed through the creditors against them.

ONE WHO HAS PAID UP.

## FOREIGN MINING AND METALLURGY.

The amelioration which has taken place recently in the situation of affairs in the St. Dixier group is sustained, but without any more marked progress being made. The orders received supply work freely in all the foundries, forges, and manufactories, but prices are absolutely without change. Refining pig (charcoal-made) is dealt in by continuation at 47. 16s. per ton; this is a quotation generally admitted. The mixture of coke with charcoal is adopted every day more and more, and some new blast-furnaces are devoting themselves to this fabrication; only a small number of furnaces now continue operations with pure charcoal. The prices of iron and other products indicated in preceding bulletins are maintained without any variation. A better demand is indicated for chain iron, which may bring about, if not a rise, at any rate more firmness and uniformity in prices. On the Marseilles market English iron in warehouse is quoted at 87. 16s. per ton, and English pig 51. 2s. per ton. Correspondence from the eastern group confirms the amelioration previously reported. The forges have received many orders, as well as special in merchants' irons, but principally for the latter. It is stated that the Moyeuvre works are about to resume the fabrication of rails in order to provide for the numerous engagements of the house of Wendel, and for the execution of which the resources of Styring would not suffice. The sale of pig and stretched irons is very active, and it may be noted that this eastern group, notwithstanding its large production of pig, witnesses almost a scarcity of that article. The considerable stocks of Novembeau have been run off, and it appears that another blast-furnace is about to be lighted. Some producers of iron certainly find themselves short of pig. The Hayange house has only one blast-furnace in activity at its works; the others are in course of demolition, but will be replaced by furnaces of greater capacity. In the Meurthe, the state of affairs is good. Pont-à-Mousson has sold a large quantity of pig in the Nord, and has engaged the production of one blast-furnace for a year; the proprietors are constructing a third furnace. Frouard and Champigneulle have important engagements, as that, having reference to the large production, there is relatively little to sell. The industries of the Moselle and the Meurthe continue to urge on the Government the importance of securing a canalisation of the Moselle; nine-tenths of the necessary funds have been provided. The Eastern of France and Western of France Railway Companies have submitted for official approval a new common tariff for tranship, by slow trains, to and from the principal termini of the two networks. The tariff proposes rather material reductions. It is stated that the Eastern of France Company will soon publish new common tariffs, which it has this moment under consideration with the Orléans, Paris, Lyons and Mediterranean, and Southern of France Companies.

At several previous periods the advantage has been enforced of as frequent meetings as possible of producers, and also the establishment of a bourse for the purchase and sale of metallurgical products. It may be remembered that a pretty large majority of Belgian forgemasters had expressed an opinion that the constitution of a bourse for metals at Brussels was useful and desirable. A commission has been appointed to consider the question, and, after having adopted the bases of a project, it has occupied itself with the means of realising the scheme. This would be a step in advance; and, with a view of realising it more promptly, arrangements have been made by the Commercial and Industrial Company of Brussels. This union of merchants has just established in Brussels, in the Rue de l'Eveque, a commercial house, which, although scarcely opened, has already become the rendezvous of a considerable number of business men, who transact there large affairs in cereals, oils, sugars, coffee, cottons, and wools. Metals are also quoted on this bourse, and it is this fact which especially led us to speak of this new institution. In the list of prices for March 23 we remark that Scotch pig in warehouse is dealt in at 47. to 47. 4s.; copper in ingots, 100z.; and Banca tin, 126z. to 128z. per ton. Some forgemasters have conceived the idea of adopting this centre for their meetings, and also of rendering them more frequent. It is hoped that many of them will associate themselves with the idea, and thus form the commencement of a regular metal market. Great activity continues to prevail in the Belgian market, the activity being especially divided between rail-plates, merchants' irons, and refining pig. At Liège this last article has been the object of a very active demand, so that the works have their production engaged for a long time beforehand; for some time past the establishments of this group have furnished the fabrication of casting pig displays a considerable tendency to diminish, and blast-furnaces are being re-fitted or re-lighted in a great measure for the production of refining pig. The great revival in the iron trade is the cause of this, while, on the other hand, the orders for the foundries do not tend much to increase, so as to render a larger production of casting-pig necessary. At Charleroi, refining pig, hard iron, has made 37. 8s. to 37. 10s.; ditto, tender iron, 37. 4s.; pig, fine-grained iron, 47. to 47. 4s.; double pig, 37. 16s. to 47. ; casting pig, No. 1, 47. 4s. to 47. 6s.; ditto, No. 2, 47. 4s.; ditto, No. 3, 47. 2s.; ditto, No. 4, 47. 4s.; ditto, No. 5, 37. 18s.; charcoal-made pig, 67. 1s.; pipes, 67. 6s. to 71. ; rolled irons, No. 1, mixed, 67. 16s. to 71. ; rolled irons, No. 2, slightly hard, 71. 8s. to 72. 1s.; rolled irons, No. 3, hard, 71. 8s. to 87. 4s.; ditto, No. 4, 71. 8s. to 87. 12s.; plates, 67. 16s. to 72. 1s.; hammered irons, first-class, 107. 12s. to 107. 16s.; ditto, second-class, 111. 16s. to 121. ; third-class, 132. to 137. 4s.; hammered irons, charcoal-made, first-class, 147. 8s.; second-class, ditto, 151. 12s.; third-class, 167. 8s.; double T-irons, first-class, 77. 8s.; second-class, ditto, 81. 12s. to 87. 16s.; third-class, ditto, 107. 12s. to 107. 16s.; ditto, fourth-class, 117. 6s. to 121. ; plates of commerce, 2 to 2½ millimetres thick, 97. 16s. to 107. ditto, 1 to 1½ millimetres thick, 117. to 117. 4s.; ditto, thinner, 117. 8s. to 117. 12s. per ton. At Liège, refining pig, hard iron, has made 37. to 37. 12s.; refining pig, No. 2, 27. 17s. 6d. to 37. ; grey refining pig, 37. 10s. to 37. 12s.; casting pig, No. 1, 47. 8s.; ditto, No. 2, 47. 4s.; ditto, No. 3, 47. 2s.; ditto, No. 4, 47. 8s.; ditto, No. 5, 37. 16s. per ton. Rolled irons, No. 1, 77. 4s.; ditto, No. 2, 77. 16s.; ditto, No. 3, 87. 8s.; ditto, No. 4, 97. 12s.; ditto, of commerce, coke-made, 127. 8s.; ditto, of commerce, charcoal-made, 167. 8s. per ton. A Charleroi letter says:—"The state of the English market should not cause any uneasiness to our forgemasters. The fall which pig has experienced in England is only the effect of speculation. The only true market of affairs in England must be sought in the total of the exports and the stock of pig. The exports continue to increase, while the stock diminishes. This is a good sign, and we may have every confidence in the continuance of the fortunate revival which has done so much for our metallurgy." The writer, whose letter appears in the *Journal des Mines*, adds:—"Speculation in England has more reference to pig than in Belgium, because it is well known that in England this product passes from the blast-furnace into the hands of commercial agents or commissioners, who by means of warrants make pig a veritable article of the Bourse. At Charleroi, the current of affairs becomes more and more considerable, especially with foreign countries, and prices are everywhere rising. The adjudication of 500 tons of rails, required for the Belgian State lines, was obtained by the Châtelineau at 67. 17s. 8d., and the Thy-le-Château Company at 71. 5s. 11d. per ton. As regards coal, we are in a period of transition, which may be accounted the dead season with respect to the sale of coal; nevertheless, negotiations have been commenced for the supply of warehouses, which the winter has completely exhausted. There are large requirements to satisfy, and they might bring back firmness in prices if our colliery owners had a better understanding with each other. This is the period when affairs are usually concluded with refiners of French sugar, but as many orders as usual cannot be expected from this source, the crop of beetroot having failed last year. In the department of the Somme this crop has only yielded a third, and in the Aisne half of what it ordinarily produces. The fabrication of sugar having been in consequence of these circumstances much below that of former years, it follows that there remains in the warehouses of manufacturers coal which must be consumed this year. The collieries of the intermediate basin are preparing to utilise their products for all the purposes for which they are suitable. The owners of the Piéton-Campagne Colliery are about to establish 50 coke furnaces."

We may note a few facts with regard to the position of two important joint-stock undertakings. First, with respect to a Belgian company for the fabrication of steel (*Société Anonyme pour la Fabrication de l'Acier*), it appears that the operations of the company are steadily expanding. Thus, the report of the council of administration and the council of surveillance showed that in 1863 the total fabrication in the works of the company at Couillet and Hamont was 9000 tons of products of every description, of which 4450 tons were delivered at Paris. In 1862 the total production was only 6800 tons, of which 2900 tons were sold at Paris. The means of production, nevertheless, were not increased in the year which has just elapsed, and the increase in the products is due only to the installation of special fabrications: they are now disposed so as to obtain from the tools the greatest possible production, while realising notable economies. An issue of obligations, authorised by a previous assembly, has been very successful, the securities having been placed at par (20%), with a bonification of interest. The second concern which we propose to notice is the Parisian company for lighting and heating by gas (*Compagnie Parisienne d'Éclairage, et de Chauffage par le Gaz*). This enterprise is in a very flourishing position; 7,157,000 additional cubic metres of gas having been consumed in 1863 as compared with 1862. In reviewing the progress of the working since 1855, an augmentation of 147 per cent. appears in the consumption of gas, and a further development in the company's business is expected when all the fine *quartiers* which will form "new Paris" are completed. The dividend for 1863 is fixed at 19 per cent., as against 17 per cent. in 1862.

As regards the foreign metal market, it may be observed that the fall of copper in England has not remained without influence at Hamburg; holders have made some slight reduction, but, nevertheless, affairs display little animation. Little business has been done at the new rates, as well at Berlin as at Cologne; some small purchases have been made to meet the requirements of consumption. On the Dutch market the copper of the Society of Commerce is in little demand, and makes 57 dls. at Rotterdam, Drontheim has made 65 dls.; and United States 63 dls. to 65 dls. At Havre affairs in Chilian appear to have revived, but prices have undergone some depreciation. Considerable quantities of Chilian are stated to have been purchased in England on account of French merchants, and this description has gained some favour on the Paris market, where it is quoted at 97. per ton; other sorts were in little demand. No improvement is reported in tin. At Amsterdam some small quantities have been dealt in at 68½ dls. to 69 dls., but these prices are sustained with some difficulty. At Rotterdam 69 dls. have been paid, but, in consequence of the fall in the English market, Banca has fallen to 68½ dls. and 68 dls.; Billiton is quoted at 68½ dls. At Paris the market has been quiet, and prices have been rather feeble; Banca has made 124.; English, 119.; and Detroit, 120. At Hamburg the article has been little sought after, and prices have been feeble. The soft German lead on the Hamburg market is firmly held; on the other hand, for delivery it would be obtainable at a slight fall; of other sorts there was no great stock on hand. At Berlin the article is in a good position, and prices are very firm, purchasers obtaining no concession. There has been a well-sustained demand at Rotterdam, and prices have been reported; at Paris lead has been much sought after, and has sustained former rates. The

## THE MINING JOURNAL.

situation of the zinc market is generally satisfactory. At Hamburg prices have risen sensibly, and numerous transactions have been concluded. At Breslau prices have been very firm, and have displayed a rising tendency. The demand for zinc has also been good on the Paris market; rough Silesian has been dealt in regularly at 231. 8s. to 233. 12s., and rolled has been sustained at 261. 6s. per ton.

**Meetings of Public Companies.**

**THE COMPANY OF COPPER MINERS IN ENGLAND.**

The annual general court of the Governor and Company of Copper Miners in England will be held at the London Tavern, Bishopsgate-street, on Thursday, when the statement of accounts, of which the subjoined is abstract, and the report of the court of assistants, will be submitted.

The profit and loss account shows:—

Profit on the works .....	£ 34,515 1 11
Suspense account .....	91 14 10
Transfer fees .....	3 17 6 = £ 34,610 14 3
Balance previous year .....	£ 15,232 0 4
London office expenses, and commission to salesmen .....	1,943 0 10
Interest .....	555 7 11
Law charges .....	40 1 8
Court of assistants, secretary, and auditors .....	2,400 0 0 = 20,170 10 9
Leaving credit balance .....	£ 14,440 3 6

The balance-sheet shows:—

Expenditure, as per previous account .....	£ 332,196 3 0
Stocks at Cwm Avon .....	210,310 12 4
Sundry debtors .....	52,614 7 6
Bills receivable .....	49,408 17 1
Cash at bankers, &c. .....	7,020 0 2 = £ 651,550 0 1
Capital, as per previous accounts .....	£ 588,275 0 0
Sundry creditors .....	31,419 19 5
Bills payable .....	15,798 0 3
Suspense account .....	1,616 16 11 = 637,109 16 7

Leaving credit balance, as above .....

£ 14,440 3 6

The auditors (Messrs. Alexander Beattie and W. J. Whatman) report that all the cash payments have been duly vouch'd, the quantities of the convertible stocks certified. The valuations of the stocks appear to them to have been made on the safe principle of a low average of market prices, which has been found to be most important after the experience they have had of great and sudden fluctuations. The principle of charging any outlay on account of new works, as well as keeping up the repairs of the whole previously existing works and plant, to the revenue of the year, has been maintained, as stated in our last year's report, and besides this, the balance of outlay on new works' account amounting to the sum of 1457. 18s. has been written off the past year, thus closing that account.

The report of the court of assistants stated that the accounts now presented are for the year ending Jan. 23, 1864, and they show a net profit made within that period of 29,672. 3s. 10d. The measures taken in the three preceding years to adjust the company's affairs, according to the then prevailing adversity, have caused the return of more prosperous times to be immediately felt, and although a healthy state of trade did not prevail until some months of the past year had elapsed, the profitable result which the court of assistants have the pleasure to report has been secured. The amount of profit has in no way been increased by a re-valuation of stocks—the prices of the company's production have materially improved, but the stock valuations remain at what they were reduced to when the markets were most depressed, with one exception, and in that case a further reduction has been made. The whole of the money spent in improving the works has been written off—the past year having borne not only all the current expenditure of that nature, but also the residue of similar outlay in previous years. At the works the minerals are well developed, the plant and machinery are in a greatly improved condition, and everything is ready for extensive and economical working; all that is needed to ensure a satisfactory return to the shareholders is a continuance of a good demand with reasonably prices, and of this there is at the present time a very fair prospect. During the year just ended there was a vastly increased demand for copper; so great, indeed, that the large stocks of copper ore in this country—the accumulation of over production during several years—were cleared off, and for a short time a scarcity of raw material was apprehended. This excessive animation has been followed by a degree of languor, but there is good ground for believing that the requirements of copper are increasing, and that the resources of the South Wales for copper smelting purposes will become increasingly valuable. In the middle and later months of the year a considerable improvement took place in the iron and tin-plate trades, and it has been tolerably well maintained. The disturbing political events in Europe and America still operate prejudicially, but the need of the productions of these two important branches of manufacture is too great for such influences to have a lasting effect, and a period of comparative prosperity may reasonably be expected. The several items in the annual accounts require but little comment. The liabilities are small and the book debts are good, and in the interval which has elapsed since the making up of the accounts, the major part of which has been settled. Within the year one bad debt was made, but the amount realised from some old claims previously written off was sufficient to cover the loss, and leave a small sum at the credit of profit and loss account.

After deducting from the profit of the past year the sum of £5,237. 0s. 4d. lost in the three previous years, there remains £4,440. 3s. 6d. for division, and the court of assistants beg to recommend that a dividend of 5 per cent. be declared upon the preference shares. When this shall have been paid, the arrear of dividend upon the preference shares, up to Sept. 5 next, will be 25 per cent.—equal to £2,068. 15s., payable out of future profits. In two former reports mention was made of Port Talbot, and the court of assistants have the pleasure to announce that the works at the harbour are in an advanced state. The connection with the South Wales Railway has been formed, and the shipment of coal from the Welsh steam coal district will probably commence within a month or so. The anticipated increase in the trade of the port is expected to assist the shipping operations of the Cwm Avon Works very materially, and eventually some return may be obtained upon the harbour bonds and shares held by the company, and which for upwards of twenty years have been entirely unproductive. At the extra general court of the company, held in May last, in consequence of the death of the late lamented Deputy-Governor, Mr. George Gay, the office which had become vacant was filled by the election of Sir Samuel Canard, Bart., and at the same time Sir Macdonald Stephenson was elected to fill the office of an assistant. The three members of the court of assistants who retire this year by rotation are—Sir John Henry Peily, Bart., Governor; Capt. Charles John Boasquet, R.N., assistant; and Mr. John Peiley, Kennard—all of whom, being eligible, offer themselves for re-election. The auditors—Mr. Alexander Beattie and Mr. William Godfrey Whatman—are willing to serve again, if it be the pleasure of the proprietors to re-elect them.

## GREAT WHEAL BUSY MINING COMPANY.

A special general meeting of shareholders was held at the company's offices, Austinfriars, on Wednesday.—Mr. J. FIELDING in the chair.

M. E. KING (the secretary) read the notice convening the meeting.

The CHAIRMAN said that he met his fellow-shareholders upon the present occasion with great satisfaction, inasmuch as it afforded him an opportunity of congratulating them upon the continued improving position of their property. The present meeting, however, had been convened for a special purpose: it was distinctly understood at the last meeting that whenever the committee should receive from the manager an assurance that Great Wheal Busy proper had been brought into a self-supporting condition, they should convene a special meeting, to consider the propriety of dividing the Great Busy portion of the sett from that known as Hallenbeagle, and to conduct them as separate adventures. That time had now arrived, for Great Busy was not only producing a monthly profit, but the accounts to be submitted at the next general meeting would show for the first time a large amount on the credit side of the book, the result of which was that they had drawn out certain propositions which they thought would meet the views of their fellow-shareholders. He might mention that the committee, including their own shares, held proxies representing nearly 5000 shares, unanimously in favour of the course suggested.

The SECRETARY, referring to Old Hallenbeagle, stated that in October last a course of ore was discovered in the 36 fm. level of 70 fms. in length, from which in six weeks 900t. worth of ore was raised and sold, leaving a net profit of 500t. Unfortunately, however, the wet season set in, which, for the time, prevented further development. But the water was falling back, and there was reason to believe that in the course of the summer, by the intersection of Wheal Rose lode, Hallenbeagle would become a dry mine. A provisional contract had been entered into by the committee for the purchase and erection of a steam-whim, so that they could be able to draw from the mine immediately the men went to work in their respective tributes. Looking at the discovery, he considered that Hallenbeagle would prove a great success, and with but a small cost to the adventurers.

Mr. JOHN FIELD enquired if it were proposed to make a call upon the present occasion?—The SECRETARY said it was not proposed to make a call now, but at the expiration of the three months, ending with March inclusive, the costs would be divided, when a small call would have to be made. The same course was adopted with regard to Boscamen.

Mr. J. FIELD said he should have thought it would have been better to make a call upon the present occasion.—The SECRETARY said that the committee thought it better to carry out all the arrangements before any call was made, for by the adoption of that course they would know the exact amount required.

</div

in existence was able to show a profit equal to 10 per cent., he thought they were in as favourable a position as they could wish.

Mr. Justice HALIBURTON, M.P., remarked that it was the more satisfactory, considering the extra expenses which had to be incurred during the first year of a company's existence.

A SHAREHOLDER enquired the use to which it was intended to apply the steamer referred to in the report?—The CHAIRMAN said that the object of the steamer was principally to tow down lighters from Nanaimo to Victoria, but that she also carried coal herself. They hoped likewise to get a subsidy to carry the mails. He might explain that the current was such that sailing vessels could not possibly use the inner channel, and that the use of the steamer would give them an advantage of 70 miles.—Mr. SELBY observed that she paid her expenses out by the freight she carried himself.

Major GORDON enquired whether any of the town lots had yet been sold, and what was their estimated value?—Mr. Justice HALIBURTON said that some of them had been sold, and that the value of the land varied from \$400 to \$700 per acre; the water lots were, of course, more valuable.—The CHAIRMAN said that the value of the land would depend very materially upon Nanaimo being made a port of entry. By their last advices they were informed that the Governor was likely to accede to their wishes.

A SHAREHOLDER asked whether the burning of lime would be attended with profit?—The CHAIRMAN believed so. They certainly would not burn it unless they found it profitable to do so. When he was there they were exporting it to San Francisco.—Mr. SELBY said that the two main questions were the land and the coal.

Mr. HILL remarked that he saw the names of several of their directors on the board of the British, Columbia, and Vancouver Island Financial Company, and would be glad to learn whether the prospects of that undertaking were good, or whether it would have any effect upon their own company?—Mr. SELBY occupied a seat at the board of the Investment Company, and could only say that both he and the other directors of the Coal Mining and Land Company had every reason to anticipate the best possible results for the Investment Company. The meeting might rely upon it that it would have no prejudicial effect upon their company—quite the reverse. The Investment Company could borrow money here on their debentures, and realise the high rate of interest paid in Vancouver Island upon it. He considered that any circumstances which tended to aid settlement in the district could not fail to be advantageous to them. Nanaimo is by far the most important port of Vancouver Island as to geographical position, both in the island and as to British Columbia.

Upon the proposition of Mr. SELBY, the retiring directors—the Hon. C. W. W. Fitzwilliam and Mr. IRWIN—were re-elected; and, upon the proposition of Mr. FRY, Messrs. Woodhouse and Lovelock were appointed auditors, and £17. each was awarded as remuneration.

A SHAREHOLDER enquired whether a special resolution declaring the dividend had been passed?—Mr. SELBY said that it had not. The directors felt that they would not be justified in doing so until the accounts, properly audited, were before them. The documents on the table, which were, no doubt, correct, were open to the inspection of the shareholders, but they could not take them as official until they had been audited.

Thanks were then voted to the directors and secretary.

Mr. JUSTICE HALIBURTON tendered his best thanks on behalf of the board for the vote just passed. There were some adverse circumstances to overcome at first, but they were now happily passed. The quality of the coal was now proved to be so good that the shipments were rapidly increasing, and it was likely that it would supersede English coal in the Pacific. It was found that with a slight admixture of Welsh coal they obtained a better mixture than any that could be procured here.

Major GORDON considered that, judging from the excellent results achieved, there must have been great exertions on the part of those in Vancouver Island, and he believed that he would only be expressing the sentiments of the shareholders generally in proposing a special vote of thanks to Messrs. Nicol and Wallace.

Mr. JUSTICE HALIBURTON considered that the exertions of the resident officers were very satisfactory to the company.

Mr. SELBY said they had received suggestions from Vancouver that they should make some contribution to the schools; they felt the justice of the proposition, but, being in a fiduciary position, they had simply given a promise to Mr. Nicol and the bishop that the question should be brought before the company. It was explained that the proposition of the bishop was that he should provide two-thirds of the expenses of the school (the school is built), upon condition that the company should provide one-third. This would be 50/- a year, but it was for the shareholders to decide what they would do in the matter.

Mr. JUSTICE HALIBURTON thought that nothing should be done until they had the regularly audited accounts before them, and that then whatever was given should be as a donation only.—The subject was then left to the discretion of the directors.

Mr. CRACK (the secretary) then read the notice convening the extraordinary general meeting, and it was resolved that in future the meetings shall be held in May and Nov., instead of March and Sept., and that there be an extraordinary meeting on the first Thursday in May next, to confirm this resolution.

Upon the proposition of the Rev. Mr. ROBINSON, thanks were voted to the Chairman for his conduct in the chair, and the proceedings terminated.

#### NERBUDDA COAL AND IRON COMPANY.

The annual general meeting of proprietors was held at the London Tavern, on Thursday,—Mr. HENRY HAYMEN in the chair.

Mr. HEATH (the secretary) read the notice convening the meeting. The report of the directors (an abstract of which appeared in last week's Journal) was taken as read.

The CHAIRMAN said the report contained all the information the directors had to communicate upon the subject of the contract with the Great Indian Peninsula Railway Company. But a letter had been received from Mr. Hunt, who was engaged in constructing the Jubbulpore portion of the East India Railway, in which he stated that he was glad the proposed agreement with the railway company had failed, for he was persuaded it was for the interest of the Nerbudda Company not to make any arrangements at present with them. Since that letter had been received, one of his colleagues had received a letter which had been written by Mr. Walker, the manager of the Raneeunge Colliery, in which he stated that the Nerbudda coal showed the best results, for he (Mr. Walker) had made some experiments with it, and it had produced results better than any other description of Indian coal—it gave out the same heat as many of the best English coal, and was well suited for locomotive purposes. Those letters would have appeared in the report of the directors had not an objection been raised to their being printed, but permission was obtained to read them to the meeting. Having stated that he should be glad to afford any further information that might be required, he concluded by moving the adoption and reception of the report and accounts.

Mr. WILDE (a director) said that the terms offered to the Great Indian Peninsula Railway Company, some months since, were thought exorbitant, although the price proposed was slightly in excess of what (as a director of one of the Bengal Companies) he knew coal was being sold at to the East India Railway, although in Bengal there were several collieries at work. Therefore, whatever price might be ultimately asked, it could say that the directors of the Nerbudda Company had not made a fair offer.

Mr. WAGSTAFF wished to know where the interest came from that had been paid, for it appeared to him that the capital had been expended?—The CHAIRMAN replied that the interest paid to the shareholders was from a fund formed by profits on money invested, transfer fees, &c. It did not touch the capital at all.

Mr. VILLEBROOKSNETT said it appeared from the balance-sheet that the capital there was left only about 50,000/-—The CHAIRMAN said the amount referred to was simply the money in hand. The shareholders themselves thought the interest which had accumulated should be divided, and passed a special resolution to that effect.

Mr. VILLEBROOKSNETT wished to know when it was expected the railway would come up to within a reasonable distance of the company's collieries?—The CHAIRMAN said it was expected the railway would be completed up to the collieries in December next year, and the East India Railway, he believed, would be completed six months after that.

Mr. VILLEBROOKSNETT suggested that the accounts should be presented in a different form. At present they did not show what had been paid for the concession, or what had been paid for directors' fees, &c., or for the works at the mines. Those items ought to be shown, in order that proprietors might know what should be carried to capital and what to profit and loss. Had a profit and loss account been attached to the accounts originally, as was usually the case, he was quite sure no description of dividend would as yet have been declared. Had he been a shareholder at the time he should have done his utmost to have prevented it, for he could not conceive they could divide profits while the expenses were so great. He found an item in the accounts of 29/- for interest, which he considered a small amount upon 50,000/- or 60,000/-, and especially when they recollect that money for some months had been very dear.

The CHAIRMAN, in explanation, said that the general expenditure, as per balance-sheet, could not by any possibility be shown in any other way, unless the whole of the items from the beginning of the company were reprinted. The items of general expenditure would, of course, amount from year to year—the amounts were given for each separate item during the past year. As regards the expenses of management, the European expenses were now quite as much as they would be if the company had a contract, and the only addition would be for native labour. As regards the item for the contract for lime, that was a small sum paid, but it did not refer to the question mentioned in the report. The letter containing the information was not received until after the report was issued. As regards the item referred to by the hon. proprietor as for interest, it was really the balance due upon some of the interest warrants. As regards a profit and loss account, as soon as a contract was entered into the directors would only be too happy to adopt the suggestion, but until some profit was made he could not see how a profit and loss account could be drawn out. It had been said that a dividend should not have been declared, but he could inform that gentleman that it was never paid as a dividend, but merely as a payment of interest. Even that was not done by the directors, but at the suggestion of shareholders, who thought it only fair that the interest accumulated should be divided. The directors took special powers that, on June 30 and December 31, the sum was to be paid as interest, and nothing else—it did not touch the capital one way or the other. As regards the amount paid, the Government, before they would consent to grant the concession, insisted upon 20,000/- being called-up and paid to the bankers. A much larger sum than that was paid up by the shareholders, and that was where the profit came from which had been received by the shareholders in the shape of interest, the amount being invested in Indian debentures, &c., and placed on deposit at the various joint stock banks.

Mr. VILLEBROOKSNETT wished to know what portion of the 24,000/-—the sum expended—had been placed to capital, and what portion to profit and loss?—The CHAIRMAN said the whole had been placed to capital.—Mr. VILLEBROOKSNETT did not think that was a correct way of proceeding, and stated that it would bring their affairs into a very unimperial position.—The CHAIRMAN said the expenditure up to the present time had shown itself perfectly clear, and no other plan could be adopted until a contract was entered into. The moment they got into a question of profits the whole of the details would be given to the proprietors in the shape of a profit and loss account.

Mr. BLACKWELL (the consulting engineer) stated that the demand for coal had not yet commenced, but still they were raising coal and stocking it—perhaps some 2000 or 3000 tons had been raised. When he came from India, some months since he went into the question as to the position and capabilities of the company's property. But he sent to inform those who had but recently become shareholders that they had been sent to India two large steam-engines, boilers, and a large assortment of plant, which, he need hardly say, had cost several thousand pounds. A mile of trackway had been laid down, and a great deal of underground working had been carried on. Of course they could not in four years open a large mining property without a large outlay: that which cost 10,000/- in England would be cheaply done at 20,000/- in India. But the colliery was now simply waiting for a demand for coal, when a large and lucrative business would be commenced. At the present time the colliery was in a position to produce 200 or 300 tons of coal per week, but it was now being put in a position to raise much greater quantities. At the present price of coal, if they only raised 10,000 tons per annum, there would be a very good dividend for the shareholders. As soon as the railway was opened, it would run within 10 miles of the colliery, and be entirely dependent upon this colliery. At least, the only other means was to bring coal from Bombay—a distance of 600 miles, and where it would cost 30s. or 40s. per ton. He certainly thought it was for the future advantage of this company that the railway company did not enter into the contract. He had been a large shareholder from the first, and he certainly did not intend to part with any of his interest, at any rate until he had received some good dividends. Ultimately, he did not see any limit to the quantity of coal that might be raised. It was believed the railway would make a branch line to the colliery.

The CHAIRMAN said they possessed the power to make a railway, if the railway company did not do it.

Mr. WILDE said if the railway company did not come to terms with them, the result would be that they would have to pay more for their coal. The colliery could be sold to-morrow for four or five times the amount it had cost the company. Judging by the Bengal prices for coal, the colliery was worth 150,000/-.

Mr. HUNTER quite agreed with the directors that the amount laid out for the opening of the colliery must go to the debit of capital.—The CHAIRMAN, in reply to a question, stated that if more capital were required the directors would, probably, make a small call on the 1/- shares, although they could issue debentures, but it entirely depended upon circumstances.—The report and accounts were received and adopted unanimously. The retiring directors and auditors were re-elected.

The meeting having been made special, it was agreed that the original agreement with Mr. Blackwell (the consulting engineer) should be cancelled, and that in future his salary be 300/- per annum, and 1½ per cent. upon the net profits after 5 per cent. had been earned, the directors reserving the power to redeem the agreement for 7500/-.

Some formal alterations were made in the Articles of Association.

A vote of thanks to the Chairman and directors terminated the proceedings.

#### TRUTH'S ECHOES, OR SAYINGS AND DOINGS IN MINING.

Notwithstanding the impediments to general business, arising from the Easter holidays, together with the preparation for, and the usual, fortnightly settlement or account, there has been a considerable amount of business transacted in the Mining Share Market during the week, and there appears to be an active market in prospective. The account took place on Thursday, when some heavy business was completed, although there was an evident tightness in monetary matters. For several progressive and dividend mines there have been good enquiries at advanced rates, whilst others have declined or fluctuated.

WEST SETON and WHEAL SETON have been freely dealt in, but left off weaker.—CLIFFORD have slightly improved, and in fair demand.—NANGLES have been done at lower rates.—EAST BASSETT and BULLER are in better request, and slightly improved.—EAST CARNARVON are advanced, and more enquired for.—TINCROFTS are offered at lower rates.—SOUTH TOLGUS and CARROLL find buyers at higher rates.—GREAT SOUTH TOLGUS are heavy, at quoted prices.—WESTWORTH CONSOLS are rather quiet, but show a tendency to improve.—WHEAL GREENVILLEs have been in good demand, and large transactions have followed, at improved rates, with a prospect of further improvement.—EAST GREENVILLEs have fluctuated, but left off firmer.—NORTH TREASERAYs have been done at lower rates, but likely to improve.—ST. DAY UNITEDs continue firm, and freely dealt in.—GREAT WHEAL BUSY have advanced, and eagerly sought for, in consequence of the separation of Old Hallenbridge Mine, to be worked independent of the former: the shares having been allotted to the holders of Great Wheal Busy, pro rata.—WHEAL KITTY (St. Agnes) have been quiet, but are rather more in request.—EAST ROSEWRAEWS have been done at lower rates, notwithstanding the improved prospects of the mine.—WEST CHIVERTONs have not been quite so active.—CHIVERTONs continue heavy at present prices.—NORTH SHEPHERDS and CHIVERTON MOOR are offered at lower rates.—EAST LOVELLS have again advanced, and are in good demand at higher figures, arising from a reported improvement in the mine.—BASSETT and GRIVELLS have been dealt in at higher rates, and good at present prices.—GREAT WHEAL FORTUNES have declined, in consequence of a falling off in the value of the recent discoveries.—SITHNEY and CARNARVON and SITHNEY WHEAL METAL have been quoted lower, although the prospects of the former are looked upon as greatly improved.—SOUTH CONDUROWS have been freely dealt in at improved prices, but since receded.

GREAT WHEAL VOR continue to command an active market, and have been largely dealt in, advancing on the late decline.—PROSPER UNITEDs are slightly better, and more enquired for.—EAST PROVIDENCE have been done at nominal prices.—PROVIDENCE and MARGARET shares are rather quiet.—SOUTH CARADONS are in request at minimum quotations.—EAST CARADONS have advanced, and are in good demand, arising from the improved prospects of the mine, and the expected increased dividend at the ensuing meeting.—MARKE VALLEYS are slightly better.—GONAMENA and HERODSTFOOT are in request, at buyers' prices.—TRELAWNY and MARY ANN are also enquired for at minimum quotations.—DEAKE WALLS have slightly improved, and more business doing.—HINSTON DOWNS have been quiet, but maintain their quotations.—EAST RUSSELLS are in good request at improved rates.—CREBORA have declined, but likely to recover.—EAST CARADON: Counter Lode: The 50 east, on north part, is worth 25/- per fm. The 60 east is worth 10/-; the 60 east, 5/-; the 80 east, 20/-; and the 80 west, from 20/- to 25/- per fm. They have commenced the cross-cut from this lode in the 80 towards the new lode level, 100 west:—North Lode: The 60 east is worth 12/- per fm.; the 70 east, 5/- per fm.—South Lode: The 70 east is worth 25/- per fm.; the 70 west, 10/- per fm. The quarterly meeting will be held on Wednesday, when a dividend of at least 22s. 6d. per share may be expected, with a good balance carried over from the profits of the three months' working.—East TREASERAY is still looking very promising in the 12 west, the two stops being worth together, 16/- per fm., the end 5/-, and the eastern stop 16/- per fm.: the lode appears to be holding down very satisfactorily. The eastern ground is improving for driving.

WHEAL GREENVILLE is reported to have improved in several important points. In the 110 west they have a good lode, and daily expecting to intersect the new lode in that level; this lode is looking well in the 100 east. The rise in the 100 west is in a lode worth 15/- per fm.; in this level they have also a leader of tin valued at 70/- per fm.; and all the upper levels, both east and west, are yielding large quantities of rich work. The general prospects of the mine have greatly improved, and bid fair to prove a permanent and profitable character.—EAST GREENVILLE is also reported to be looking much better, and improving as the ground is being developed.

BASSETT AND GRIVELLS.—The prospects here are of the most encouraging nature, the mine having generally improved. The return of tin will be kept up for some time; at present they are raising over 1 ton per day.—GREAT WHEAL FORTUNE.—The recent discoveries have fallen off in value, but there are appearances which are considered of high importance in several places, and will no doubt lead to great results. Although of no positive value for tin, it is the certain harbinger of better things.

At SITHNEY and CARNARVON the prospects continue to improve, and are of a most encouraging character. The lode in the winze in the bottom of the 85 is looking remarkably well, rather better than last week, and the 95 is expected to be cut daily, and when fairly developed will open a long run of rich tin ground. The cutting of the new lode, south of Wheal Sithney engine, is of vast importance, as, in driving about 20 fms. west, they will be in a line with the channel of ground which made the rich course in the adit, and in the 15, on the Sithney lode, and is opposite the rich tin ground in Wheal Michal; therefore, great improvements are fully anticipated to come off shortly.

JAMES LANE.

From Mr. EDWARD COOKE:—A fair amount of business has been done during the week, and prices of several mines have advanced. Among those that have been favourably affected are EAST LOVELL, EAST CARADON, PROSPER UNITED, and WHEAL GREENVILLE. GREAT WHEAL VORs have been steady. Until the market is cleared of the large number of shares that have been bought on speculative account there will not be much rise. The mine is steadily improving, and bids fair to become again as important as it was years gone by. If necessary there would be no difficulty in returning nearly double the quantity of tin monthly than is now being done. The purchase of the adjoining mine, East Wheal Vor, with all its complete plant of machinery, has now been finally settled, and operations at the mine will be at once commenced. There probably has never been a company formed to work a mining property under more favourable auspices than that of East Wheal Vor. The work done already would have required a long time and large capital for its completion, all of which is available to the present company. The shafts have been sunk nearly to a depth at which the immense deposits of tin have been found at Great Wheal Vor, and the lodes at the deepest part of East Wheal Vor now show sufficient indications to justify their being termed master lodes. The operations in this mine have not been barren of results, as from 12,000/- to 13,000/- worth of tin has already been raised and sold. The particulars and reports relating to East Wheal Vor will, however, be soon before the public; they will then be enabled to judge for themselves of this mine, which has been termed by a thorough practical agent of great ability as one of the best pieces of undeveloped tin mining ground in the world situated in the same basin of kilns ground that has produced several millions sterling worth of tin in Great Wheal Vor. According to my anticipations, EAST LOVELL shares have advanced. I am at a loss to conceive why this mine has not been fairly represented to the investing public, but have rather been made a sort of football (if I may use the term) by certain parties in the market, who, for reasons best known to themselves, have blown hot and cold on the merits of this property. Having lately visited the mine, and have had reliable information, I am induced to believe that the shares will yet see a great rise. My reasons for this opinion are formed from the actual state of the mine. The lode in the shaft has been worth above 100/- per fm. for its length, or, say, 50/- per cubic fathom during the whole of the sinking from the 26 fm. level. In a few weeks, this shaft will be down to 36 fms., when levels, both east and west, will be extended in a rich branch of tin. The monthly profits are now about 300/- to 350/- per month. NORTH CHIVERTON is now showing every indication of becoming a splendid property.

From Mr. JAMES CROFTS:—Whatever difference of opinion may exist on the subject of holidays, there is no doubt that they are rapidly adding one more to the "Institutions" of the country, and, to adopt the popular side of the question, deservedly so, for possibly it may be conceded that short periods of relaxation from business rather give a zest to its resumption than otherwise, and thus since the late Easter holiday has faded into the past there is certainly renewed activity in the Mining Market, principally among the higher class of shares, whilst in most others the sales are very limited, accompanied by considerable discrimination on the part of investors, in the eschewing that class of concerns constantly, and for many years in succession, subject to calls. The new fashion of providing out of the first cost of shares an assumed ample capital to work a mine to the point of success is apparently much relished by investors, and deserves praise. A mine thus constituted, and upon whose merits the writer commented a fortnight since—NORTH CHIVERTON—has, for instance, 4000/- capital in hand, said to be a sum ample for its development; and, supposing a cost of 200/- to 250/- per month, the work may be kept on vigorously for sixteen to eighteen months, whilst, from the character given to the mine by its reporters, the capital may not be required, and certainly the report from the agent this week supports that view. Mr. Hampton writes, March 30:—"The lode in the 20 fm. level has improved for blonde, and is worth 12/- per fathom for that mineral. By next week 50 tons will be ready for sale" (value not stated, but probably 2/- to 3/- per ton); but, what is of more importance in a mine to be worked for lead, there is a good bunch reported under the blonde, which will be developed a few days after the engine goes to work. The following paragraph is also highly encouraging:—"In the new engine-shaft the indications become stronger and better as we go down, and I am thoroughly convinced that most satisfactory sales of both lead and blonde will be the result of our operations, especially as we may look at our good neighbours, and witness their prosperity under very similar circumstances." It is only necessary to add that the shares are being rapidly disposed of, and chiefly in certain large towns north of the Tweed.

A mine deserving some notice, if only on account of the writer's intimate connection with it in former years, is OKEL TOR (copper),

## Mining Correspondence.

## BRITISH MINES.

**ABERDOVEY.**—A. Ede, March 28: The lode in the stop in back of the 22 is not so good; the ground is becoming much harder, and a great deal more blonde in it. I have nothing new to report on surface, all is going on much as usual.

**BAGTOR.**—W. Hosking, March 31: The 16, driving west of Prosper eastern shaft, is much improved since last reported; it at present contains a leader about 6 in. wide, of very excellent work for tin, and its appearance, together with the tin ground driven through at this level, renders advisable the immediate sinking of Prosper eastern shaft for deeper levels, and preparatory to which we have commenced the necessary work of cutting plat, ground for cistern, &c. The 20, driving east of Prosper western shaft, is laying open a lode 3 ft. wide, and carrying just sufficient tin to render it saving work.

**BEDFORD CONSOLS.**—Capt. Mitchell, March 29: Since the last general meeting, the middle adit level has been extended east on the north lode, up to the present date, about 19 fms. 4 feet, on a lode varying in size from 14 in. to 3 ft. wide, composed of spar, mundic, capel, prian, and occasional small stones of black and yellow copper ore have been met with; the lode in the present end is a little disordered, and I think, from its general appearance, we are getting near the cross-course seen in the level above. For the future working of the mine I would recommend the present end should be pushed on with full pare of men, and prove this lode east of the above-named cross-course; also cross-cut north and south to the side lodes, which can be reached within a comparatively short distance, the north one of which is about 18 fathoms north of our present driving, with a beautiful elvan course intervening between and running parallel with the two lodes. The south lode is about 25 fms. south of the present driving, and where opened on in the shallow adit level presents a highly promising appearance, and over 40f. worth of tin has already been returned from a small portion of this lode; therefore, looking at the position of this mine, together with so many highly promising lodes which can be laid open over 60 fms. deep from surface at the present point of operations, I consider that our prospects of success are good, and that it will ultimately be found you are in possession of a splendid piece of mining property.

**BOSCAWEN.**—Edwards, H. Giles, March 26: The lode in the 80, driving west of Hunter's shaft, is 6 in. wide, unproductive. The lode in the 70, west of said shaft, is 20 in. wide, worth 18f. per fm., for copper ore. The lode in the rise in the back of this level, against No. 3 winze, is 2 ft. wide, worth 20f. per fm. The lode in the stop in back of this level is worth for copper ore 18f. per fm. The lode in the 60, driving west of Hunter's shaft, is 2 ft. wide, worth 10f. per fm. The lode in the stop in the back of this level is worth from 8f. to 10f. per fm. for copper ore. The lode in the 50 end, driving west of Hunter's shaft, is 15 in. wide, worth about 5f. per fm. We have commenced to draw from the 30 on the cancer shaft. The new shaft is down 4½ fms. from surface. Nothing new to notice since my last.

**BOTTLE HILL.**—J. Eddy, March 30: Seeing no improvement in our stops west of William's shaft, in back of the 12, we have taken six men from this part of the mine, and put them to stop east of Will's shaft, in back of the 24, where we find the lode to produce more tin than we have found in the lode about William's shaft. We have now six men driving the 24 east on the course of the lode; the lode in the end continues to hold its size, about 5 ft. wide, and producing saving work for tin, but not rich; we have also ten men stopping the back of this level, where the lode is about the same size, and producing about the same quality stuff. We have examined the adit level on the west of the south lode, and find very little surface water going down; and as the summer is now approaching, and we can fairly calculate on some months dry weather, we think it advisable to resume our operations here at once. First, we think it advisable to drive the 12 east, and hole to the rise from the 24; this would drain our shaft to the present bottom; secondly, to drive the 12 fm. level west to get under the rich shoot of ore we find gone down in the bottom of the adit level. We shall commence burning for our next aiming to-morrow.

**BRYN GWILOC.**—F. Evans, March 22: The lode at the engine-shaft is 1 foot wide, composed of blonde and lumps of lead ore, worth for the latter 15 cwt., to 1 ton per fm.; the ground is a little darker than usual. The 90 west is improving; lode 15 in. wide, with a nice leader of ore and blonde, worth for lead 1 ton per fm.; ground spare for driving. The pitches behind this end, two in number, will produce 1 ton per fm. In the 90 east the lode is principally made up of spar and lead ore mixed, yielding of the latter 15 cwt. per fm. The stopes behind this end will produce 2½ tons per fathom. The pitch under the 75 west, on the run, is worth 12 cwt. per fm. We are not yet through the shaft in the 75 west, but it will be cleared as soon as possible. The first run below this level, east of shaft, is without change since last report, worth 8 tons to the fathom; the second run, similarly situated, about 30 fms. east of engine-shaft, will yield 1½ ton to the fathom. There is no change in the old pitches. Since last report we have been hindered very much, the water from the late flood having filled the mine several fathoms above the 66. I am, however, glad to say that nearly every pitch and again in full operation. We are getting on with the new dressing-floors, and the engineers loose no time in fixing crusher, &c.

**F. Evans.**—March 30: At the engine-shaft sinking below the 90 the ground is a little darker than usual; the lode, which is about 1 ft. wide, produces stones of lead, with a little blonde. The lode in the 90 west will produce nearly 1 ton of lead ore per fathom; it is about 15 in. wide, but ground rather spare for driving. The two pitches in the roof of this level will produce about 1 ton per fm. The pitch in the run below the 75 west is worth 12 cwt. per fm. We are sinking in good ore ground, worth 2 to 3 tons per fm. The old pitches in the roof of the 66 are without change, working at 6f. per ton. The engineers are busy fixing crusher, and everything connected with the mine is being carried on vigorously.

**DOLFRWYN OG.**—T. Kirkpatrick, March 28: No. 3 Shaft: This has been sunk 3 feet 6 in. since my last, making a total for the past month of 16 feet, or 2 fms. 4 feet; I have now set the last fathom we have to sink at 10f. per fm. We have not cut any visible gold this week, but the quartz is looking as promising as ever. We have been able to push on well with the surface operations, having had beautiful weather this week. The stamps are all in place, the amalgamator fixed, the round baffle in hand, and I hope it will be finished this week. Morris Pugh will finish the water-wheel to-day. I shall commence working the little Brittons to-day, and will run 1 or 2 tons through them before stopping.

**EAST BOTTLE HILL.**—J. Eddy, March 31: We are still driving east of cross-course in the adit level by four men; we find the lode still disordered; it carries a little tin and copper, but not sufficient to value.

**EAST CAERADON.**—J. Seccombe, March 30: Caunter Lode: The 50 east, north part, is worth 25f. per fathom; the 60 east, 10f.; the 70 east, 5f.; the 80 east, 20f.; and the 80 west from 20f. to 25f. per fm. We have commenced the cross-cut from this lode at the 80 towards the new lode.—New Lode: The 60 east is worth 12f. per fathom. The 70 east is worth 5f. per fm.—South Lode: The 70 east is worth 25f. per fm. The 70 west is worth 10f. per fm.

**CARADON CONSOLS.**—Wm. Rich, March 29: We have intersected the north lode to the east of the cross-course to the 80, and have opened on it a short distance, but it is not so large, nor looking so kindly going east as it does west; I have, therefore, suspended operations in this direction for the present, and have men employed making the necessary preparations for rising in the back of the 80, with the view to open a communication with the 68, and thereby give good ventilation. In the meantime we are forcing on the end west by six men, on the north lode, which is carrying good spots of ore, and has an exceedingly promising appearance. The ground in the cross-cut south is favourable for working, and looks congenial for copper. The driving of the 80 fm. level west, on engine lode, is resumed.

**CEFFY CILCEN.**—W. Lester, March 31: Susan's Shaft: The 89 yard level has been driven during the winter about 14 fathoms, and upon calculation we are still from 10 to 15 yards from the north and south lode, called Thistlefield lode, and which has been the object of continuing this level. The lode is 18 in. wide, composed of shale and spar, with a little lead. The office shaft has been sunk to the 34, and when down to the 40 a cross-cut will be driven to intersect the lode on the north, distant about 20 yards.

**CENTRAL MINERA.**—W. Davies, March 29: The building for the engine has been carried on with all speed for the last fortnight, the weather being very favourable, and a good part of the masonry erected. This week again the weather has very much altered—strong winds, rains, and snow, so that the masons are doing but very little towards completion. We expect fine weather daily.

**CHIVERTON WHEAL ROSE.**—J. Phillips, March 29: The eastern end, on Milted's lode, is looking much better. We broke good samples of leadstuff again to-day. I think it very evident we are driving over an important piece of lead ground; this end is going to hill, and gaining ground very fast; I should say there is every probability of having a good bunch of lead before long, particularly when we intersect the two lodes ahead.

**CLEER'S HILL.**—S. Cooke, March 31: The men engaged in stopping on the middle lode, in back of the adit level, have drawn to surface a quantity of rich tinstuff, worth full 3 cwt. of tin to the 100 sacks; the lode is in beautiful killas, and still continues good, now 12 fms. back in length going west or towards the hill; the lode in the same end is 3 ft. wide, of the same character and quality as the stopes in back of the same lode. I do not hesitate to say that we have an good a property in Cleer's Hill as the district can produce. We can work 20 fathoms deep without any pumping machinery. All that is required is reduction power to make Cleer's Hill a lasting and paying mine. Nothing new in any other part of the mine to mention. I have had some experienced men on the ground this week inspecting the mine. They all say to me that they are satisfied with Cleer's Hill, and believe it to be as good as there is in the district. As to the locality, it is well known for its richness for tin.

**CONNORRE.**—Capt. Bishop, March 26: Deep Adit: The rock is of the same character as for some time past.—The 54, west of Engine-shaft: The lode here is composed of a better material for the production of copper ore, and is yielding good ore.—The 45, west of Engine-shaft: The matrix of the lode here is chiefly sulphur, with good copper ore disseminated through it.—The 20, west of New Shaft: This part of the mine is much the same for copper ore.—The 18, west of Field's Shaft: The ends here are a little improved for copper ore, and the lode contains less sulphur.—The 10, west of Old Cross-cut: The stratum here is improving, and I think is likely to produce copper ore shortly.

The 10, south of Tracey's Shaft: I cannot speak of much change here, the composition of the lode being much the same, and the yield or just the same as reported in my last.—The 10 Cross-cut, south of Tracey's Shaft: No change for the week.—The 20 Cross-cut, south of Tracey's Shaft: The ground here is rather harder, and progress is consequently slower. The stopes on the great copper and other lodes are yielding copper ore, just as described in my last report.

**COOLARTRA AND BOND.**—Geo. Henwood, John Jones, March 21: Underground Works: In the 15 fm. level, north of the shaft, we have the tributary busily employed; his pitch is very materially, and to all appearance, permanently improved; the ground all through it is filled with branches of lead and blonde; it never looked so well before. In this level, in the cross-cut driving east, we cut through to old works this day, so this will soon be worked out. At 4 fm. south of the Red shaft we placed one miner and one labourer to cross-cut east from the footwall to the hanging wall; they have a beautiful end at present, cut this day: It is full of rich branches of blonde, spotted with lead, carbonate of lime, carbonate of iron, mundic, &c. &c.; it will pay well for working; we are within 1 fm., or thereabouts, of the hanging wall. In the 20 fm. level we have two tributaries, who have taken a venture at 5f. per ton for lead. In the 25 fm. level are two men, preparing for the cistern; we shall lower the 3-ft. match-piece to-morrow, to enable them to complete it. On the footwall, south of the engine-shaft, two men are stopping the back—of the same value as last reported; also two men in bottom wall, parallel to the above, are engaged preparing to stop a good lode of lead in the bottom. Surface Operations: Our jiggling machines answer their purpose effectually, and are in almost constant use, the engine works as usual; the large cisterns for the shaft is finished, and ready for being taken to pieces and lowered. Now the fine weather has set in we purpose bringing in the stream of water for dressing purposes, which was delayed during the wet weather and short days; we shall also let the formation of an engine-pool by contract, the specifications for which are preparing. We have ascertained the lode is still before us at the deep adit, and shall advise its being resumed as soon as the weather moderates sufficiently. We were hindered one day last week by the festival of St. Patrick, and fear we shall be similarly situated this week owing to Good Friday. We weighed in upwards of half a ton of cleaned lead and one ton of blonde; these would have been more, but we were hindered, as above stated, on our principal washing-day.

—W. H. Rowe, March 24: I have now examined and minutely surveyed every accessible part of your mine below ground, and the principal points of interest at surface. I would remark, in the first place, that there seems no doubt of the lode being the eastern one of the adjoining (Tassan) mine, to the south, where, on it, at the depth of 80 fms., I understand they have at this moment a valuable deposit of ore; moreover, I think it very probable there exist parallel lodes in your sett, particularly westward. I think, however, there is every encouragement to proceed vigorously with the mine, and, in my opinion, the appearances in the sole of the 25 give strong evidence of good deposits of ore below. The shaft should be resumed sinking without a moment's unnecessary delay,

and I would suggest to sink to a 40 fm. level, in order to get a greater hold upon the ore ground, and on account of its being so easily wrought. In conclusion, I need only say that if the mine be energetically worked, anticipate the results will be satisfactory to the shareholders.

**CRANE.**—H. Skewis, March 31: A lode has been discovered near the river in the western part of the sett, of a very promising character, but on which I cannot report fully for a week or two. No alteration in any other part of the mine since my last.

**CRENNY AND WHEAL ABRAHAM UNITED.**—J. Vivian, March 31: The excavations for engine-house are in a forward state, the two large houses are ready for the masons to commence immediately, and also the steam-whim house. At Vivian's shaft we have also cleared for saw-mill, smithy, account-house, or offices for the mine, with several thousand tons of stone on the different flats for building; we have also cleared the old shaft; for footway to the deep adit, and have put in a new footway to this deep adit level; we are progressing fast with securing the collar of engine-shaft, and have brought into these mines a large amount of the heavy pitwork. Our setting took place yesterday on the mines, when we let by contract the building of the engine-houses for the 90, 80, and 70-in. engines, with boiler-houses, and stacks for the same; also three steam-whim houses for the same, with the saw-mill, smithy, account-house, &c., also, and all the carriage of materials from the different ports in the West of Cornwall. All the operations are going on satisfactorily.

**CROWAN CONSOLS.**—John Seymour, March 28: The shaftmen are progressing speedily with their works at Ward's shaft. They have finished cutting the plait at the 30, and are now engaged putting in a plat, solar, &c.; after this is completed they will have to sink 6 feet in the shaft for bearers and cistern preparatory for fixing the new lift of pumps. The stopes east and west of the shaft are still producing some tin and copper ore; two of the pitches are also producing some good tinstuff, and copper of a low quality. We shall sample tinstuff on Friday, and sell on Tuesday next. I think you may expect the 30 fathom level to be a good one, and I assure you we have every prospect of a good mine.

**CUDDRA.**—F. Puckey, March 9: There is no alteration to notices in the 105 fathom level, as we are still driving the ends, both east and west, in the killas under the lode. In the 90 fm. level west we have cut into the lode 3 feet, but it is not yet cut through; as far as seen the lode is improved in character, being now composed of a beautiful peat, mixed with quartz, and producing some very good work for tin, but not rich; we have also the carriage of materials from the different ports in the West of Cornwall. All the operations are going on satisfactorily.

**CROWAN CONSOLS.**—John Seymour, March 28: The shaftmen are progressing speedily with their works at Ward's shaft. They have finished cutting the plait at the 30, and are now engaged putting in a plat, solar, &c.; after this is completed they will have to sink 6 feet in the shaft for bearers and cistern preparatory for fixing the new lift of pumps. The stopes east and west of the shaft are still producing some tin and copper ore; two of the pitches are also producing some good tinstuff, and copper of a low quality. We shall sample tinstuff on Friday, and sell on Tuesday next. I think you may expect the 30 fathom level to be a good one, and I assure you we have every prospect of a good mine.

**CUMWERN.**—F. Puckey, March 9: There is no alteration to notices in the 105 fathom level, as we are still driving the ends, both east and west, in the killas under the lode. In the 90 fm. level west we have cut into the lode 3 feet, but it is not yet cut through; as far as seen the lode is improved in character, being now composed of a beautiful peat, mixed with quartz, and producing some very good work for tin, but not rich; we have also the carriage of materials from the different ports in the West of Cornwall. All the operations are going on satisfactorily.

**CUMWERN.**—F. Puckey, March 9: There is no alteration to notices in the 105 fathom level, as we are still driving the ends, both east and west, in the killas under the lode. In the 90 fm. level west we have cut into the lode 3 feet, but it is not yet cut through; as far as seen the lode is improved in character, being now composed of a beautiful peat, mixed with quartz, and producing some very good work for tin, but not rich; we have also the carriage of materials from the different ports in the West of Cornwall. All the operations are going on satisfactorily.

**CUMWERN.**—F. Puckey, March 9: There is no alteration to notices in the 105 fathom level, as we are still driving the ends, both east and west, in the killas under the lode. In the 90 fm. level west we have cut into the lode 3 feet, but it is not yet cut through; as far as seen the lode is improved in character, being now composed of a beautiful peat, mixed with quartz, and producing some very good work for tin, but not rich; we have also the carriage of materials from the different ports in the West of Cornwall. All the operations are going on satisfactorily.

**CUMWERN.**—F. Puckey, March 9: There is no alteration to notices in the 105 fathom level, as we are still driving the ends, both east and west, in the killas under the lode. In the 90 fm. level west we have cut into the lode 3 feet, but it is not yet cut through; as far as seen the lode is improved in character, being now composed of a beautiful peat, mixed with quartz, and producing some very good work for tin, but not rich; we have also the carriage of materials from the different ports in the West of Cornwall. All the operations are going on satisfactorily.

**CUMWERN.**—F. Puckey, March 9: There is no alteration to notices in the 105 fathom level, as we are still driving the ends, both east and west, in the killas under the lode. In the 90 fm. level west we have cut into the lode 3 feet, but it is not yet cut through; as far as seen the lode is improved in character, being now composed of a beautiful peat, mixed with quartz, and producing some very good work for tin, but not rich; we have also the carriage of materials from the different ports in the West of Cornwall. All the operations are going on satisfactorily.

**CUMWERN.**—F. Puckey, March 9: There is no alteration to notices in the 105 fathom level, as we are still driving the ends, both east and west, in the killas under the lode. In the 90 fm. level west we have cut into the lode 3 feet, but it is not yet cut through; as far as seen the lode is improved in character, being now composed of a beautiful peat, mixed with quartz, and producing some very good work for tin, but not rich; we have also the carriage of materials from the different ports in the West of Cornwall. All the operations are going on satisfactorily.

**CUMWERN.**—F. Puckey, March 9: There is no alteration to notices in the 105 fathom level, as we are still driving the ends, both east and west, in the killas under the lode. In the 90 fm. level west we have cut into the lode 3 feet, but it is not yet cut through; as far as seen the lode is improved in character, being now composed of a beautiful peat, mixed with quartz, and producing some very good work for tin, but not rich; we have also the carriage of materials from the different ports in the West of Cornwall. All the operations are going on satisfactorily.

**CUMWERN.**—F. Puckey, March 9: There is no alteration to notices in the 105 fathom level, as we are still driving the ends, both east and west, in the killas under the lode. In the 90 fm. level west we have cut into the lode 3 feet, but it is not yet cut through; as far as seen the lode is improved in character, being now composed of a beautiful peat, mixed with quartz, and producing some very good work for tin, but not rich; we have also the carriage of materials from the different ports in the West of Cornwall. All the operations are going on satisfactorily.

**CUMWERN.**—F. Puckey, March 9: There is no alteration to notices in the 105 fathom level, as we are still driving the ends, both east and west, in the killas under the lode. In the 90 fm. level west we have cut into the lode 3 feet, but it is not yet cut through; as far as seen the lode is improved in character, being now composed of a beautiful peat, mixed with quartz, and producing some very good work for tin, but not rich; we have also the carriage of materials from the different ports in the West of Cornwall. All the operations are going on satisfactorily.

**CUMWERN.**—F. Puckey, March 9: There is no alteration to notices in the 105 fathom level, as we are still driving the ends, both east and west, in the killas under the lode. In the 90 fm. level west we have cut into the lode 3 feet, but it is not yet cut through; as far as seen the lode is improved in character, being now composed of a beautiful peat, mixed with quartz, and producing some very good work for tin, but not rich; we have also the carriage of materials from the different ports in the West of Cornwall. All the operations are going on satisfactorily.

**CUMWERN.**—F. Puckey, March 9: There is

in existence was able to show a profit equal to 10 per cent., he thought they were in as favourable a position as they could wish.

Mr. Justice HALIBURTON, M.P., remarked that it was the more satisfactory, considering the extra expenses which always had to be incurred during the first year of a company's existence.

A SHAREHOLDER enquired the use to which it was intended to apply the steamer referred to in the report?—The CHAIRMAN said that the object of the steamer was principally to tow down lighters from Nanaimo to Victoria, but that she also carried coal herself. They hoped likewise to get a subsidy to carry the mails. He might explain that the current was such that sailing vessels could not possibly use the inner channel, and that the use of the steamer would give them an advantage of 70 miles.—Mr. SELBY observed that she paid her expenses out by the freight she carried.

Major GORDON enquired whether any of the town lots had yet been sold, and what was their estimated value?—Mr. Justice HALIBURTON said that some of them had been sold, and that the value of the land varied from \$400 to \$700 per acre; the water lots were, of course, more valuable.—The CHAIRMAN said that the value of the land would depend very materially upon Nanaimo being made a port of entry. By their last advices they were informed that the Governor was likely to accede to their wishes.

A SHAREHOLDER asked whether the burning of lime would be attended with profit?—The CHAIRMAN believed so. They certainly would not burn it unless they found it profitable to do so. When he was there they were exporting it to San Francisco.—Mr. SELBY said that the two main questions were the land and the coal.

Mr. HILL remarked that he saw the names of several of their directors on the board of the British, Columbia, and Vancouver Island Financial Company, and would be glad to learn whether the prospects of that undertaking were good, or whether it would have any effect upon their own company?—Mr. SELBY occupied a seat at the board of the Investment Company, and could only say that he and the other directors of the Coal Mining and Land Company had every reason to anticipate the best possible results for the Investment Company. The meeting might rely upon it that it would have no prejudicial effect upon their company—quite the reverse. The Investment Company could borrow money here on their debentures, and realize the high rate of interest paid in Vancouver Island upon it. He considered that any circumstances which tended to aid settlement in the district could not fail to be advantageous to them. Nanaimo is by far the most important port of Vancouver Island as to geographical position, both in the Island and as to British Columbia.

Upon the proposition of Mr. SELBY, the retiring directors—the Hon. C. W. W. FITZWILLIAM and Mr. IRWIN—were re-elected; and, upon the proposition of Mr. FRY, Messrs. WOODHOUSE and LOVELOCK were appointed auditors, and 217 each was awarded as remuneration.

A SHAREHOLDER enquired whether a special resolution declaring the dividend had been passed?—Mr. SELBY said that it had not. The directors felt that they would not be justified in doing so until the accounts, properly audited, were before them. The documents on the table, which were, no doubt, correct, were open to the inspection of the shareholders, but they could not take them as official until they had been audited.

Thanks were then voted to the directors and secretary.

Mr. JUSTICE HALIBURTON tendered his best thanks on behalf of the board for the vote just passed. There were some adverse circumstances to overcome at first, but they were now happily passed. The quality of the coal was now proved to be so good that the shipments were rapidly increasing, and it was likely that it would supersede English coal in the Pacific. It was found that with a slight admixture of Welsh coal they obtained a better mixture than any that could be procured here.

Major GORDON considered that, judging from the excellent results achieved, there must have been great exertions on the part of those in Vancouver Island, and he believed that he would only be expressing the sentiments of the shareholders generally in proposing a special vote of thanks to Messrs. NICOL and WALLACE.

Mr. JUSTICE HALIBURTON considered that the exertions of the resident officers were very satisfactory to the company.

Mr. SELBY said they had received suggestions from Vancouver that they should make some contribution to the schools; they felt the justice of the proposition, but, being in a fiduciary position, they had simply given a promise to Mr. Nicol and the bishop that the question should be brought before the company. It was explained that the position of the bishop was that he should provide two-thirds of the expenses of the school (the school is built), upon condition that the company should provide one-third. This would be 50/- a year, but it was for the shareholders to decide what they would do in the matter.

Mr. JUSTICE HALIBURTON thought that nothing should be done until they had the regularly audited accounts before them, and that then whatever was given should be as a donation only. The subject was then left to the discretion of the directors.

Mr. CHACE (the secretary) then read the notice convening the extraordinary general meeting, and it was resolved that future the meetings shall be held in May and Nov., instead of March and Sept., and that there be an extraordinary meeting on the first Thursday in May next, to confirm this resolution.

Upon the proposition of the Rev. Mr. ROBINSON, thanks were voted to the Chairman for his conduct in the chair, and the proceedings terminated.

#### NERBUDDA COAL AND IRON COMPANY.

The annual general meeting of proprietors was held at the London Tavern, on Thursday, Mr. HENRY HAYMEN in the chair.

Mr. HEATH (the secretary) read the notice convening the meeting. The report of the directors (an abstract of which appeared in last week's Journal) was taken as read.

The CHAIRMAN said the report contained all the information the directors had to communicate upon the subject of the contract with the Great Indian Peninsula Railway Company. But a letter had been received from Mr. Hunt, who was engaged in constructing the Jubbulpore portion of the East India Railway, in which he stated that he was glad the proposed agreement with the railway company had failed, for he was persuaded it was for the interest of the Nerbudda Company not to make any arrangements at present with them. Since that letter had been received, one of his colleagues had received a letter which had been written by Mr. Walker, the manager of the Ranegeunge Colliery, in which he stated that the Nerbudda coal showed the best results, for he (Mr. Walker) had made some experiments with it, and it had produced results better than any other description of Indian coal—it gave out the same heat as many of the best English coal, and was well suited for locomotive purposes. Those letters would have appeared in the report of the directors, had not an objection been raised to their being printed, but permission was obtained to read them to the meeting. Having stated that he should be glad to afford any further information that might be required, he concluded by moving the adoption and reception of the report and accounts.

Mr. WILDE (a director) said that the terms offered to the Great Indian Peninsula Railway Company, some months since, were thought exorbitant, although the price proposed was slightly in excess of what (as a director of one of the Bengal Companies) he knew coal was being sold at to the East India Railway, although in Bengal there were several collieries at work. Therefore, whatever price might be ultimately asked, no one could say that the directors of the Nerbudda Company had not made a fair offer.

Mr. WAGSTAFF wished to know where the interest came from that had been paid, for it appeared to him that the capital had been expended?—The CHAIRMAN replied that the interest paid to the shareholders was from a fund formed by profits on money invested, transfer fees, &c. It did not touch the capital at all.

Mr. VILLEBOISNET wished to know when it was expected the railway would come up to within a reasonable distance of the company's collieries?—The CHAIRMAN said it was expected the railway would be completed up to the collieries in December next year, and the East India Railway, he believed, would be completed six months after that.

Mr. VILLEBOISNET suggested that the accounts should be presented in a different form. At present they did not show what had been paid for the concession, or what had been paid for directors' fees, &c., or for the works at the mines. Those items ought to be shown, in order that proprietors might know what should be carried to capital and what to profit and loss. Had a profit and loss account been attached to the accounts originally, as was usually the case, he was quite sure no description of dividend would as yet have been declared. Had he been a shareholder at the time he should have done his utmost to have prevented it, for he could not conceive they could divide profits while the expenses were so great. There had been an item in the accounts of 29/- for interest, which he considered a small amount upon 5000/-, and especially when they recollect that money for some months had been very dear.

The CHAIRMAN, in explanation, said that the general expenditure, as per balance-sheet, could not by any possibility be shown in any other way, unless the whole of the items from the beginning of the company were reprinted. The item of general expenditure would, of course, augment from year to year—the amounts were given for each separate item during the past year. As regards the expenses of management, the European expenses were now quite as much as they would be if the company had a contract, and the only addition would be for native labour. As regards the item for the contract for lime, that was a small sum paid, but it did not refer to the question mentioned in the report. The letter containing the information was not received until after the report was issued. As regards the item referred to by the hon. proprietor as for interest, it was really the balance due upon some of the interest warrants. As regards a profit and loss account, as soon as a contract was entered into the directors would only be too happy to adopt the suggestion, but until some profit was made he could not see how a profit and loss account could be drawn out. It had been said that a dividend should not have been declared, but he could inform that gentleman that it was never paid as a dividend, but merely as a payment of interest. Even that was not done by the directors, but at the suggestion of shareholders, who thought it only fair that the interest accumulated should be divided. The directors took special powers that, on June 30 and December 31, the sum was to be paid as interest, and nothing else—it did not touch the capital one way or the other. As regards the amount paid, the Government, before they would consent to grant the concession, insisted upon 20,000/- being called-up and paid to the bankers. A much larger sum than that was paid up by the shareholders, and that was where the profit came from which had been received by the shareholders in the shape of interest, the amount being invested in Indian debentures, &c., and placed on deposit at the various joint-stock banks.

Mr. VILLEBOISNET wished to know what portion of the 24,000/- the sum expended—had been placed to capital, and what portion to profit and loss?—The CHAIRMAN said the whole had been placed to capital.—Mr. VILLEBOISNET did not think that was a correct way of proceeding, and stated that it would bring their affairs into a very unusual position. The CHAIRMAN said the expenditure up to the present time had shown itself perfectly clear, and no other plan could be adopted until a contract was entered into. The moment they got into a question of profits the whole of the details would be given to the proprietors in the shape of a profit and loss account.

Mr. BLACKWELL (the consulting engineer) stated that the demand for coal had not yet commenced, but still they were raising coal and stocking it—perhaps some 2000 or 3000 tons had been raised. When he came from India, some months since, he went into the question as to the position and capabilities of the company's property. But he might inform those who had but recently become shareholders that there had been sent to India two large steam-engines, boilers, and a large assortment of plant, which, he need hardly say, had cost several thousand pounds. A mile of tracway had been laid down, and a great deal of underground working had been carried on. Of course they could not in four years open a large salting property without a large outlay: that which cost 10,000/- in England would be cheaply done at 20,000/- in India. But the colliery was now simply waiting for a demand for coal, when a large and lucrative business would be commenced. At the present time the colliery was in a position to produce 200 or 300 tons of coal per week, but it was now being put in a position to much greater quantities. At the present price of coal, if they only raised 10,000 tons per annum, there would be a very good dividend for the shareholders. As soon as the railway was opened, it would run within 10 miles of the mine, and be entirely dependent upon this colliery. At least, the only other means was to bring coal from Bombay—a distance of 600 miles, and where it would cost 30s. or 40s. per ton. He certainly thought it was for the future advantage of this company that the railway company did not enter into the contract. He had been a large shareholder from the first, and he certainly did not intend to part with any of his interest, at any rate until he had received some good dividends. Ultimately, he did not see any limit to the quantity of coal that might be raised. It was believed the railway would make a branch line to the colliery.

The CHAIRMAN said they possessed the power to make a railway, if the railway company did not do it.

Mr. WILDE said that the railway company did not come to terms with them, the result would be that they would have to pay more for their coal. The colliery could be sold to-morrow for four or five times the amount it had cost the company. Judging by the Bengal prices for coal, the colliery was worth 150,000/-.

Mr. HUNT quite agreed with the directors that the amount laid out for the opening of the colliery must go to the debit of capital.—The CHAIRMAN, in reply to a question, stated that if more capital were required the directors would, probably, make a small call on the 12/- shares, although they could issue debentures, but it entirely depended upon circumstances.—The report and accounts were received and adopted unanimously. The retiring directors and auditors were re-elected.

The meeting having been made special, it was agreed that the original agreement with Mr. Blackwell (the consulting engineer) should be cancelled, and that in future his services would be 300/- per annum, and 1½ per cent. upon the net profits after 5 per cent. had been earned, the directors reserving the power to redeem the agreement for 7500/-.

Some formal alterations were made in the Articles of Association.

A vote of thanks to the Chairman and directors terminated the proceedings.

TRUTH'S ECHOES, OR SAYINGS AND DOINGS IN MINING.

Notwithstanding the impediments to general business, arising from the Easter holidays, together with the preparation for, and the usual, fortnightly settlement or account, there has been a considerable amount of business transacted in the Mining Share Market during the week, and there appears to be an active market in prospective. The account took place on Thursday, when some heavy business was completed, although there was an evident tightness in monetary matters. For several progressive and dividend mines there have been good enquiries at advanced rates, whilst others have declined or fluctuated.

WEST SETON and WHEAL SETON have been freely dealt in, but left off weaker.—CLIFFORDS have slightly improved, and in fair demand.—NANGLES have been done at lower rates.—EAST BASSETT were freely sought for, but have been offered at lower figures since.—STRAT PARK and BULLER are in better request, and slightly improved.—EAST CARNBREAS have advanced, and more enquired for.—TINCROFTS are offered at lower rates.—SOUTH TOLCUS and CAJOGHILL find buyers at higher rates.—GREAT SOUTH TOLCUS are heavily in demand.

WEST SETON and WHEAL SETON have been freely dealt in, but left off weaker.—CLIFFORDS have slightly improved, and in fair demand.—NANGLES have been done at lower rates.—EAST BASSETT were freely sought for, but have been offered at lower figures since.—STRAT PARK and BULLER are in better request, and slightly improved.—EAST CARNBREAS have advanced, and more enquired for.—TINCROFTS are offered at lower rates.—SOUTH TOLCUS and CAJOGHILL find buyers at higher rates.—GREAT SOUTH TOLCUS are heavily in demand.

WEST CHIVERTON and WHEAL CHIVERTON have been freely dealt in, but left off weaker.—CLIFFORDS have slightly improved, and in fair demand.—NANGLES have been done at lower rates.—EAST BASSETT were freely sought for, but have been offered at lower figures since.—STRAT PARK and BULLER are in better request, and slightly improved.—EAST CARNBREAS have advanced, and more enquired for.—TINCROFTS are offered at lower rates.—SOUTH TOLCUS and CAJOGHILL find buyers at higher rates.—GREAT SOUTH TOLCUS are heavily in demand.

WEST CHIVERTON and WHEAL CHIVERTON have been freely dealt in, but left off weaker.—CLIFFORDS have slightly improved, and in fair demand.—NANGLES have been done at lower rates.—EAST BASSETT were freely sought for, but have been offered at lower figures since.—STRAT PARK and BULLER are in better request, and slightly improved.—EAST CARNBREAS have advanced, and more enquired for.—TINCROFTS are offered at lower rates.—SOUTH TOLCUS and CAJOGHILL find buyers at higher rates.—GREAT SOUTH TOLCUS are heavily in demand.

WEST CHIVERTON and WHEAL CHIVERTON have been freely dealt in, but left off weaker.—CLIFFORDS have slightly improved, and in fair demand.—NANGLES have been done at lower rates.—EAST BASSETT were freely sought for, but have been offered at lower figures since.—STRAT PARK and BULLER are in better request, and slightly improved.—EAST CARNBREAS have advanced, and more enquired for.—TINCROFTS are offered at lower rates.—SOUTH TOLCUS and CAJOGHILL find buyers at higher rates.—GREAT SOUTH TOLCUS are heavily in demand.

WEST CHIVERTON and WHEAL CHIVERTON have been freely dealt in, but left off weaker.—CLIFFORDS have slightly improved, and in fair demand.—NANGLES have been done at lower rates.—EAST BASSETT were freely sought for, but have been offered at lower figures since.—STRAT PARK and BULLER are in better request, and slightly improved.—EAST CARNBREAS have advanced, and more enquired for.—TINCROFTS are offered at lower rates.—SOUTH TOLCUS and CAJOGHILL find buyers at higher rates.—GREAT SOUTH TOLCUS are heavily in demand.

WEST CHIVERTON and WHEAL CHIVERTON have been freely dealt in, but left off weaker.—CLIFFORDS have slightly improved, and in fair demand.—NANGLES have been done at lower rates.—EAST BASSETT were freely sought for, but have been offered at lower figures since.—STRAT PARK and BULLER are in better request, and slightly improved.—EAST CARNBREAS have advanced, and more enquired for.—TINCROFTS are offered at lower rates.—SOUTH TOLCUS and CAJOGHILL find buyers at higher rates.—GREAT SOUTH TOLCUS are heavily in demand.

WEST CHIVERTON and WHEAL CHIVERTON have been freely dealt in, but left off weaker.—CLIFFORDS have slightly improved, and in fair demand.—NANGLES have been done at lower rates.—EAST BASSETT were freely sought for, but have been offered at lower figures since.—STRAT PARK and BULLER are in better request, and slightly improved.—EAST CARNBREAS have advanced, and more enquired for.—TINCROFTS are offered at lower rates.—SOUTH TOLCUS and CAJOGHILL find buyers at higher rates.—GREAT SOUTH TOLCUS are heavily in demand.

WEST CHIVERTON and WHEAL CHIVERTON have been freely dealt in, but left off weaker.—CLIFFORDS have slightly improved, and in fair demand.—NANGLES have been done at lower rates.—EAST BASSETT were freely sought for, but have been offered at lower figures since.—STRAT PARK and BULLER are in better request, and slightly improved.—EAST CARNBREAS have advanced, and more enquired for.—TINCROFTS are offered at lower rates.—SOUTH TOLCUS and CAJOGHILL find buyers at higher rates.—GREAT SOUTH TOLCUS are heavily in demand.

WEST CHIVERTON and WHEAL CHIVERTON have been freely dealt in, but left off weaker.—CLIFFORDS have slightly improved, and in fair demand.—NANGLES have been done at lower rates.—EAST BASSETT were freely sought for, but have been offered at lower figures since.—STRAT PARK and BULLER are in better request, and slightly improved.—EAST CARNBREAS have advanced, and more enquired for.—TINCROFTS are offered at lower rates.—SOUTH TOLCUS and CAJOGHILL find buyers at higher rates.—GREAT SOUTH TOLCUS are heavily in demand.

WEST CHIVERTON and WHEAL CHIVERTON have been freely dealt in, but left off weaker.—CLIFFORDS have slightly improved, and in fair demand.—NANGLES have been done at lower rates.—EAST BASSETT were freely sought for, but have been offered at lower figures since.—STRAT PARK and BULLER are in better request, and slightly improved.—EAST CARNBREAS have advanced, and more enquired for.—TINCROFTS are offered at lower rates.—SOUTH TOLCUS and CAJOGHILL find buyers at higher rates.—GREAT SOUTH TOLCUS are heavily in demand.

WEST CHIVERTON and WHEAL CHIVERTON have been freely dealt in, but left off weaker.—CLIFFORDS have slightly improved, and in fair demand.—NANGLES have been done at lower rates.—EAST BASSETT were freely sought for, but have been offered at lower figures since.—STRAT PARK and BULLER are in better request, and slightly improved.—EAST CARNBREAS have advanced, and more enquired for.—TINCROFTS are offered at lower rates.—SOUTH TOLCUS and CAJOGHILL find buyers at higher rates.—GREAT SOUTH TOLCUS are heavily in demand.

WEST CHIVERTON and WHEAL CHIVERTON have been freely dealt in, but left off weaker.—CLIFFORDS have slightly improved, and in fair demand.—NANGLES have been done at lower rates.—EAST BASSETT were freely sought for, but have been offered at lower figures since.—STRAT PARK and BULLER are in better request, and slightly improved.—EAST CARNBREAS have advanced, and more enquired for.—TINCROFTS are offered at lower rates.—SOUTH TOLCUS and CAJOGHILL find buyers at higher rates.—GREAT SOUTH TOLCUS are heavily in demand.

WEST CHIVERTON and WHEAL CHIVERTON have been freely dealt in, but left off weaker.—CLIFFORDS have slightly improved, and in fair demand.—NANGLES have been done at lower rates.—EAST BASSETT were freely sought for, but have been offered at lower figures since.—STRAT PARK and BULLER are in better request, and slightly improved.—EAST CARNBREAS have advanced, and more enquired for.—TINCROFTS are offered at lower rates.—SOUTH TOLCUS and CAJOGHILL find buyers at higher rates.—GREAT SOUTH TOLCUS are heavily in demand.

WEST CHIVERTON and WHEAL CHIVERTON have been freely dealt in, but left off weaker.—CLIFFORDS have slightly improved, and in fair demand.—NANGLES have been done at lower rates.—EAST BASSETT were freely sought for, but have been offered at lower figures since.—STRAT PARK and BULLER are in better request, and slightly improved.—EAST CARNBREAS have advanced, and more enquired for.—TINCROFTS are offered at lower rates.—SOUTH TOLCUS and CAJOGHILL find buyers at higher rates.—GREAT SOUTH TOLCUS are heavily in demand.

WEST CHIVERTON and WHEAL CHIVERTON have been freely dealt in, but left off weaker.—CLIFFORDS have slightly improved, and in fair demand.—NANGLES have been done at lower rates.—EAST BASSETT were freely sought for, but have been offered at lower figures since.—STRAT PARK and BULLER are in better request, and slightly improved.—EAST CARNBREAS have advanced, and more enquired for.—TINCROFTS are offered at lower rates.—SOUTH TOLCUS and CAJOGHILL find buyers at higher rates.—GREAT SOUTH TOLCUS are heavily in demand.

WEST CHIVERTON and WHEAL CHIVERTON have been freely dealt in, but left off weaker.—CLIFFORDS have slightly improved, and in fair demand.—NANGLES have been done at lower rates.—EAST BASSETT were freely sought for, but have been offered at lower figures since.—STRAT PARK and BULLER are in better request, and slightly improved.—EAST CARNBREAS have advanced, and more enquired for.—TINCROFTS are offered at lower rates.—SOUTH TOLCUS and CAJOGHILL find buyers at higher rates.—GREAT SOUTH TOLCUS are heavily in demand.

WEST CHIVERTON and WHEAL CHIVERTON have been freely dealt in, but left off weaker.—CLIFFORDS have slightly improved, and in fair demand.—NANGLES have been done at lower rates.—EAST BASSETT were freely sought for, but have been offered at lower figures since.—STRAT PARK and BULLER are in better request, and slightly improved.—EAST CARNBREAS have advanced, and more enquired for.—TINCROFTS are offered at lower rates.—SOUTH TOLCUS and CAJOGHILL find buyers at

## Mining Correspondence.

## BRITISH MINES.

**ABERDOVEY.**—A. Ede, March 28: The lode in the stopes in back of the 22 is not so good; the ground is becoming much harder, and a great deal more blonde in it. I have nothing new to report on at surface, all is going on much as usual.

**BAGTOR.**—W. Hosking, March 31: The 16, driving west of Prosper eastern shaft, is much improved since last reported; it at present contains a lode about 6 in. wide, of very excellent work for tin, and its appearance, together with the tin ground driven through it at this level, renders advisable the immediate sinking of Prosper eastern shaft for deeper levels, and preparatory to which we have commenced the necessary work of cutting plat, ground for cistern, &c. The 20, driving east of Prosper western shaft, is laying open a lode 3 ft. wide, and carrying just sufficient tin to render it saving work.

**BEDFORD CONSOLS.**—Capt. Mitchell, March 29: Since the last general meeting

the middle adit level has been extended east on the north end, up to the present date, about 19 fms. 4 feet, on a lode varying in size from 14 in. to 3 ft. wide, composed of spar, mudi, capel, prian, and occasional small stones of black and yellow copper ore have been met with; the lode in the present end is a little disordered, and I think, from its general appearance, we are getting near the cross-course seen in the level above. For the future working of the mine I would recommend the present end should be pushed on with a full pace of men, and prove this lode east of the above-named cross-course; also cross-cut north and south to the side lodes, which can be reached within a comparatively short distance, the north one of which is about 18 fathoms north of our present driving, with a beautiful euan course intervening between and running parallel with the two lodes. The south lode is about 25 fms. south of the present driving, and where opened on in the shallow adit level presents a highly promising appearance, and over 40f. worth of tin has already been returned from a small portion of this lode; therefore, looking at the position of this mine, together with so many highly promising lodes which can be laid open over 60 fms. deep from surface at the present point of operations, I consider that our prospects of success are good, and that it will ultimately be found you are in possession of a splendid piece of mining property.

**BOSCAWEN.**—Edwards, R. Giles, March 26: The lode in the 80, driving west of Hunter's shaft, is 6 in. wide, unproductive. The lode in the 70, west of said shaft, is 20 in. wide, worth 18f. per fm. for copper ore. The lode in the rise in the back of this level, against No. 3 winze, is 2 ft. wide, worth 20f. per fm. The lode in the 60, driving west of Hunter's shaft, is 2 ft. wide, worth 10f. per fm. The lode in the stopes in the back of this level is worth from 8f. to 10f. per fm. for copper ore. The lode in the 50 end, driving west of Hunter's shaft, is 15 in. wide, worth about 5f. per fm. We have commenced to draw from the 30 at the caunter shaft. The new shaft is down 4½ fms. from surface. Nothing new to notice since my last.

**BOTTLE HILL.**—J. Eddy, March 30: Seeing no improvement in our stopes west of Williams's shaft, in back of the 12, we have taken six men from this part of the mine, and put them to stop east of Will's shaft. In back of the 24, where we find the lode to produce more tin than we have found in the lode about Williams's shaft. We have now six men driving the 24 on the course of the lode; the lode in the end continues to hold its size, about 5 ft. wide, and producing saving work for tin, but not rich; we have also ten men stopping the back of this level, where the lode is about the same size, and producing about the same quality stuff. We have examined the adit level on the new south lode, and find very little surface water going down; and as the summer is now approaching, and we can fairly calculate on some months dry weather, we think it advisable to resume our operations here at once. First, we think it advisable to drive the 12 east, and hole to the rise from the 24; this would drain our shaft to the present bottom; secondly, to drive the 12 fm. level west to get under the rich shoot of ore we had gone down in the bottom of the adit level. We shall commence burning for our next sampling to-morrow.

**BRYN GWIOL.**—F. Evans, March 22: The lode at the engine-shaft is 1 foot wide, composed of blende and lumps of lead ore, worth for the latter 15 cts., to 1 ton per fm.; the ground is a little darker than usual. The 90 west is improving; lode 15 in. wide, with a nice leader of ore and blonde, worth for lead 1 ton per fm.; ground space for driving. The pitches behind this end, two in number, will produce 1 ton per fm. In the 90 east the lode is principally made up of spar and lead ore mixed, yielding of the latter 15 cts. per fm. The stopes behind this end will produce 2½ tons per fathom. The pitch under the 75 west, on the run, is worth 12 cts. per fm. We are not yet through the shale in the 75 west, but it will be cleared as soon as possible. The first run below this level, east of shaft, is without change since last report, worth 3 tons to the fathom; the second run, similarly situated, about 30 fms. east of engine-shaft, will yield 1½ ton to the fathom. There is no change in the old pitches. Since last report we have been hindered very much, the water from the late flood having filled the mine several fathoms above the 66. I am, however, glad to say that nearly every pitch and bargain is in full operation. We are getting on with the new dressing-floors, and the engineers loose no time in fixing crusher, &c.

**F. Evans, March 30:** At the engine-shaft sinking below the 90 the ground is a little darker than usual; the lode, which is about 1 ft. wide, produces stones of lead with a little blonde. The lode in the 90 west will produce nearly 1 ton of lead ore per fathom; it is about 15 in. wide, but ground rather sparse for driving. The two pitches in the roof of this level will produce about 1 ton per fm. The 90 east is worth for lead 12 cts. per fm., lode 3 ft. wide, and likely to improve for lead ore. Two pitches in the roof of this level will produce 1 ton per fm. The pitch in the run below the 75 west is worth ½ ton per fm. In the run below the 75 east the lode will produce 2 tons per fathom; 30 fms. east of shaft, in this level, we are sinking in good ore ground, worth 3 to 3½ tons per fm. The old pitches in the roof of the 66 are without change, working at 6f. per ton. The engineers are busy fixing crusher, and everything connected with the mine is being carried on vigorously.

**BRYNTAIL.**—J. Roach, March 31: There is no alteration in the 20, driving east on north part of the lode, since last reported; in this level, west of shaft, we have commenced to cross-cut the lode standing north of the level; here we have small cubes of lead ore; probably it will improve as we approach the wall of the lode. I cannot speak of much alteration in the winze under the 20, still worth 20f. per fathom, and upwards. We are now rising to communicate with the 10, opposite the new engine-shaft, for ventilation, consequently the rise in the ore has been suspended until we hole. We have a great deal of stuff ready for crushing and jiggling, which I should say will yield as much ore as I expected before it was separated.

**CARADON CONSOLS.**—Wm. Rich, March 29: We have intersected the north lode to the east of the cross-course to the 80, and have opened on it a short distance, but it is not so large, nor looking so kindly going east as it does west; I have, therefore, suspended operations in this direction for the present, and have men employed making the necessary preparations for rising in the back of the 80, with the view to open a communication with the 68, and thereby give good ventilation. In the meantime we are forcing on the end west by six men, on the north lode, which is carrying good spots of ore, and has an exceedingly promising appearance. The ground in the cross-cut south is favourable for working, and looks congenial for copper. The driving of the 80 fm. level west, on engine-shaft, is resumed.

**CEDFN CILCEN.**—W. Lester, March 31: Susan's Shaft: The 80 yard level has been driven during the winter about 14 fathoms, and upon calculation we are still from 10 to 15 yards from the north and south lode, called Thistieldale lode, and which has been the object of continuing this level. The lode is 18 in. wide, composed of shale and spar, with a little lead. The office shaft has been sunk to the 24, and when down to the 40 a cross-cut will be driven to intersect the lode on the north, distant about 20 yards.

**CENTRAL MINERA.**—W. Davies, March 29: The building for the engine has been carried on with all speed for the last fortnight, the weather being very favourable, and a good part of the masonry erected. This week again the weather has very much altered—strong winds, rains, and snow, so that the masons are doing but very little towards completion. We expect fine weather daily.

**CHIVERTON WHEAL ROSE.**—J. Phillips, March 29: The eastern end, on Miltated's lode, is looking much better. We broke good samples of leadstuff again to-day. I think it very evident we are driving over an important piece of lead ground; this end is going to hill, and gaining ground very fast; I should say there is every probability of having a good bunch of lead before long, particularly when we intersect the two lodes ahead.

**CLEEF'S HILL.**—S. Cooks, March 31: The men engaged in stopping on the middle lode, in back of the adit level, have drawn to surface a quantity of rich tinstuff, worth full 3 cts. of tin to the 100 sacks; the lode is in beautiful killas, and still continues now, 12 fms. back in length going west or towards the hill; the lode in the same end is 3 ft. wide, of the same character and quality as the stopes in back of the same level. I do not hesitate to say that we have as good a property in Cleef's Hill as the district can produce. We can work 20 fathoms deep without any pumping machinery. Nothing new in any other part of the mine to mention. I have had some experience satisfied with Cleef's Hill, and believe it to be as good as there is in the district. As to the locality, it is well known for its richness for tin.

**CONNORREE.**—Capt. Bishop, March 26: Deep Adit: The rock is of the same character as for some time past.—The 54, west of Engine-shaft: The lode here is composed of a better matrix for the production of copper ore, and is yielding good ore.—The 45, west of Engine-shaft: The matrix of the lode here is chiefly sulphur, with good copper disseminated through it.—The 20, west of New Shaft: This part of the mine is much the same for copper ore.—The 18, west of Field's Shaft: The ends here are a little improved for copper ore, and the lode contains less sulphur.—The 10, west of Old Cross-cut: The strata here is improving, and I think it likely to produce copper ore shortly.

**The 10, south of Tracy's Shaft:** I cannot speak of much change here, the composition of the lode being much the same, and the yield of ore just the same as reported in my last.—The 10 Cross-cut, south of Tracy's Shaft: No change for the week.—The 20 Cross-cut, south of Tracy's Shaft: The ground here is rather harder, and progress is consequently slower. The stopes on the great copper and other lodes are yielding copper ore, just as described in my last report.

**COOLARTRA AND BOND.**—Geo. Henwood, John Jones, March 21: Underground Works: In the 15 fm. level, north of the shaft, we have the tributary busily employed; his pitch is very materially, and, to all appearance, permanently improved; the ground all through it is filled with branches of lead and blonde; it never looked so well before. In this level, in the cross-cut driving east, we cut through to old works this day, so this will soon be worked out. At 4½ ms. south of the Red shaft we placed one miner, and one labourer to cross-cut east from the footwall to the hanging wall; they have a beautiful end at present, cut this day; it is full of rich branches of blonde, spotted with lead, carbonate of lime, carbonate of iron, mudi, &c. It will pay well for working; we are within 1 fm., or thereabouts, of the hanging wall. In the 20 fm. level we have two men, preparing for the cistern; we shall lower the 3-ft. match-piece to the bottom, to enable them to complete it. On the footwall, south of the engine-shaft, two men are stopping the back—the same value as last reported; also two men in bottom wall, parallel to the above, are engaged preparing to stop a good lode of lead in the bottom.—Surface Operations: Our jiggling machines answer their purpose effectively, and are in almost constant use, the engine works as usual; the large cistern for the shaft is finished, and ready for being taken to pieces and lowered. Now the fine weather has set in we purpose bringing in the stream of water for dressing purposes, which was delayed during the wet weather and short days; we shall also let the formation of an engine-pool by contract, the specifications for which are preparing. We have ascertained the lode is still before us at the deep adit, and shall advise its being resumed as soon as the weather moderates sufficiently. We were hindered one day last week by Good Friday. We weighed in upwards of half a ton of cleaned lead and one ton of blonde; these would have been more, but we were hindered, as above stated, on our principal washing-day.

**W. H. Rowe, March 24:** I have now examined and minutely surveyed every ac-

cessible part of your mine below ground, and the principal points of interest at surface. I would remark, in the first place, that there seems no doubt of the lode being the eastern one of the adjoining (Tussen) mine, to the south, where, on it, at the depth of 80 fms., I understand they have at this moment a valuable deposit of ore; moreover, I think it very probable there exist parallel lodes in your sett, particularly westward. I think, however, there is every encouragement to proceed vigorously with the mine, and, in my opinion, the appearance in the sole of the 25 give strong evidence of good deposits of ore below. The shaft should be resumed sinking without a moment's unnecessary delay,

and I would suggest to sink to a 40 fm. level, in order to get a greater hold upon the ore ground, and on account of its being so easily wrought. In conclusion, I need only say that if the mine be energetically worked, I anticipate the results will be satisfactory to the shareholders.

**CRANE.**—H. Skewis, March 31: A lode has been discovered near the river in the western part of the sett, of a very promising character, but on which I cannot report fully for a week or two. No alteration in any other part of the mine since my last.

**CREVEN AND WHEAL ABRAHAM UNITED.**—J. Vivian, March 31: The excavations for engine-house are in a forward state, the two large houses are ready for the masons to commence immediately, and also the steam-whim house. At Vivian's shaft we have also cleared for saw-mill, smithy, account-house or offices for the mine, with several thousand tons of stone on the different plates for building; we have also cleared the old shaft for footway in the deep adit, and have put in a new footway to this deep adit level; we are progressing fast with securing the collar of engine-shaft, and have brought into these mines a large amount of the heavy pitwork. Our setting took place yesterday on the mines, when we let by contract the building of the engine-houses for the 90, 80, and 70-in. engines, with boiler-houses, and stacks for the same; also three steam-whim houses for the same, with the saw-mill, smithy, account-house, &c., also, all the carriage of materials from the different ports in the West of Cornwall. All the operations are going on satisfactorily.

**CROWAN CONSOLS.**—John Seymour, March 28: The shaftmen are progressing speedily with their works at Ward's shaft. They have finished cutting the plat at the 30, and are now engaged putting in a plat, solar, &c.; after this is completed they will have to sink 6 ft. in the shaft for bearers and cisterns preparatory for fixing the new sets of pumps. The stopes east and west of the shaft are still producing some tin and copper ore; two of the pitches are also producing some good tinstuff, and copper of a low quality. We shall sample timber on Friday, and sell on Tuesday next. I think you may expect the 30 fathom level to be a good one, and I assure you we have every prospect of a good mine.

**CUDDRA.**—F. Puckey, March 9: There is no alteration to notice in the 105 fathoms

level, as we are still driving the ends, both east and west, in the killas under the lead. In the 90 fm. level west we have cut into the lode 3 feet, but it is not yet cut through; as far as seen the lode is improved in character, being now composed of a beautiful peat, mixed with quartz, and producing some very good work for tin, and promising further improvement. In the 90, east of the cross-cut, the lode is 3 feet wide, and is unproductive. The lode in the winze sinking below this level is 4 feet wide, producing work of a low quality. In the 75 west we are driving in the killas under the lead, which is favourable for driving. In the stopes behind this end the lode is 3 feet wide, worth 10f. per fathom. The lode in the stopes in the back of this level, and west of the winze, is improved, and at the present time is 5 feet wide, and for 2 fathoms in length is of a low quality. We shall sample timber on Friday, and sell on Tuesday next. I think you may expect the 30 fathom level to be a good one, and I assure you we have every prospect of a good mine.

**CUMBERLAND CONSOLS.**—John Tredinnick, March 26: No lode has been taken down in Highburrow shaft for the past week; we have cut sufficient ground for rod and pitwork in the above shaft, and have put in bearers and cisterns at the 45 fm. level. The wind-bore, door-piece, and working-barrel have been sent down to-day. We hope to complete the whole of this work in the early part of the coming week. In the cross-cut driving south from east boundary shaft the ground is becoming a beautiful white killas, and is easier for driving. I have put a pair of men to drive a cross-cut south from Highburrow shaft, to intersect other tin and copper lodes. Nothing else new since last report.

**CUMBERLAND CONSOLS.**—F. C. Harper, March 30: We continue to progress with our different operations here pretty favourably. In the south cross-cut the ground is oozing with water, and traversed by numerous small branches, carrying spar, prian, and mandic. The north cross-cut presents a very favourable appearance. We have just now passed through a lode, which is producing large stones of mandic, quartz, peach, and prion, and letting down a quantity of water.

**GREAT DEVON AND BEDFORD (Cocharton)—(Special Report).**—Capt. S. Paul, March 22: After examining the Great Devon and Bedford (Cocharton) Mine to-day, I cannot but express the great satisfaction I experienced at the result of your operations to the present time. I find the shaft sunk 13 fms. deep below the 20, which must be allowed to be good progress, considering that for several fathoms the ground has been spars for sinking, owing to the killas being much mixed with branches of spar. Your order to commence driving at this point is, of course, the first necessary proceedings. The 20 east shows unmistakable evidences that the splendid cross-course seen at surface is at no great distance ahead of the present end: when cut, I shall not be surprised if you find it productive of lead ore; the lode in the end is about 2 ft. wide, containing capel, quartz, mandic, and prian, with stones of ore at times. The 20 west shows a lode, 4½ ft. wide, with black and yellow copper, of a rich quality; in this level, for from 6 to 8 fms. in length, there is ground passed through from which ore can at a future time be risen to advantage.

**GREAT LAXEY.**—R. Rowe, March 26: The lode in the 165 east is still going well up, and everything looks fair for the cross-cut being successful. The 110 end north is holding quite as good, and improving; if anything, worth 7 tons to the fathom. The south end is not so good as last reported. The rise in the roof of this level is about the same, worth 100f. per fm. for lead.

**GREAT NORTH DOWNS.**—J. W. Crase, M. Jenkins, March 26: The ground in Vivian's engine-shaft, sinking below the 57, is still hard, and consequently spars for sinking; there is no change in the lode since last report. The lode in the 57, driving west of the above shaft, is 4 ft. wide, worth 10f. per fm. In the 57 east boundary shaft, door-piece, and working-barrel have been sent down to-day. We hope to complete the whole of this work in the early part of the coming week. In the cross-cut driving south from east boundary shaft the ground is becoming a beautiful white killas, and is easier for driving. I have put a pair of men to drive a cross-cut south from Highburrow shaft, to intersect other tin and copper lodes. Nothing else new since last report.

**GREAT RETALLACK.**—W. H. Reynolds, March 29: The lode in the adit end east is 4 ft. wide, composed of flookan, spar, and capel, with mandic and spots of blonde; by continuing on this lode we shall intersect other north and south lodes.

**GREAT SOUTH TOLGIUS.**—John Daw, March 30: In the 166 west the lode is 1 ft. wide, unproductive. In the 154 west the lode is 3 ft. wide, worth 15f. per fm. for tin.

In the winze sinking below this level the lode is 2½ ft. wide, worth 15f. per fm. fortin. In the rise in back of the 146, east of shaft, the lode is 1½ ft. wide, producing 2 tons of copper ore per fm.

In the winze sinking below the 90, on north lode, the lode is 2 feet wide, producing 2 tons of ore per fm.

**GREAT RETALLACK.**—W. H. Reynolds, March 29: The lode in the adit end east is 4 ft. wide, composed of flookan, spar, and capel, with mandic, and spots of blonde; by continuing on this lode we shall intersect other north and south lodes.

**GREAT SOUTH TOLGIUS.**—John Daw, March 30: In the 166 west the lode is 1 ft. wide, unproductive. In the 154 west the lode is 3 ft. wide, worth 15f. per fm. for tin.

In the winze sinking below this level the lode is 2½ ft. wide, worth 15f. per fm. fortin. In the rise in back of the 146, east of shaft, the lode is 1½ ft. wide, producing 2 tons of copper ore per fm.

In the winze sinking below the 90, on north lode, the lode is 2 feet wide, producing 2 tons of ore per fm.

**GREAT WHEAL BUSY.**—J. Edwards, J. Petherick, W. Trelease, March 23: The lode in the 140, west of Wheal Rose's engine-shaft, is 1 ft. wide, worth 10f. per fm. for tin; the lode in this level, driving east of said shaft, is 2 ft. wide, worth from 10f. to 12f. per fathom for tin. The lode in Oxford's shaft, sinking below the 130, is 4½ ft. wide, worth 10f. per fm. for tin; the end improves as we descend through the capels of the tin lode without leaving yet reached the north wall, or, in my opinion, the tin-bearing part of the lode. The ground in the 50 fm. level cross-cut, driving north, is spar for driving. The water in the mine in the last fortnight has decreased one stroke per minute.

**GREAT RETALLACK.**—W. H. Reynolds, March 29: The lode in the adit end east is 4 ft. wide, composed of flookan, spar, and capel, with mandic, and spots of blonde; by continuing on this lode we shall intersect other north and south lodes.

**KELLY BRAY.**—G. Rowe, March 30: Saturday last being the monthly setting-day, the following tutwork bargains were set:—The 25 to drive east from western engine-shaft by six men, stent 3 fms., at 41. 10s. per fm. The lode in the present end is 2½ ft. wide, composed principally of quartz, spotted with black oxide of copper, and yielding a little saving work. The 70 fathom level to drive east from eastern engine-shaft by six men, stent 3 fms., at 81. 10s. per fm.; the lode at this point is small and unproductive. The 60 cross-cut to drive north by six men, stent 3 fms., at 81. 10s. per fm. The 40 to drive east, on the north lode, by four men, stent 2 fms., at 41. 10s. per fm.; the lode in this end is at present small and poor, but an improvement may be expected. All the wheeling, trimming, and landing by three men for the month, at 10s. All the smith's work in the mine for one month, at 41. 10s. We weighed off on Monday the last samplings of one, 68 tons 10 cwt.

**LADY BERTHA.**—Capt. Harpur and Methereill, March 31: In the 53 east the lode is from 2 to 3 ft. wide, composed of mundic, quartz, peach, and spots of ore. No lode has been taken down in the 53 west during the week. In the 41 east the lode is about 2 ft. wide, composed of peach, mundic, quartz, and spots of ore. The lode in the 30 east is about 1 ft. wide, composed of quartz, mundic, and peach, with occasional stones of ore. The lode in the pitches in back of this level is equal in value as we last reported, composed of ore, mundic, and peach, worth of the former 20s. per fm. The sinking of the new shaft below the 30 is progressing pretty favourably. The tribute pitches continue to produce much as usual.

**LANIVET.**—J. Tregay, March 30: We hope to have the engine ready to work by the latter part of next week; also the rods and pump-work at Oulton's engine-shaft, when we shall then sink away upon Yancey's lode. The rods and pump-work on Petrie's shaft will have to be put up afterwards, as well as the stamps erection, so that at first the engine will not have much work to perform, merely pumping from one shaft. We have sank Oulton's shaft a little since the last report, but the water has again prevented our going further, although it had fallen a trifle lower. The lode is looking well in the bottom, and we believe, that on setting the engine to work, and sinking, we shall meet with further improvement.

**LELANT CONSOLS.**—J. Williams, March 26: The engine-shaft is sinking by eight men. We are now 8 ft. below the 75; the lode is 2 ft. wide, and tinnish, but not to value. We are driving the 75 east and west, by six men, at 31. and 21. 10s. per fm.; lode worth 22. and 11. 10s. per fm. We are also driving the 65 west, by four men, at 50s. per fm.; lode worth 30s. per fm. The 55 is driving west by the same number of men, at 40s. per fm., and will pay for driving. We are rising the back of the 65, by four men, at 40s. per fm.; the lode here is worth 30s. per fm., and we have two men stopping the back at 40s. per fm.; lode worth 50s. per fm. In addition to the above we are driving a cross-cut south at the 65, by two men and two boys, at 31. 10s. per fm. We anticipate a lode near at hand south of the present workings, and this cross-cut will reach it.

**MAUDLIN.**—T. Tregay, March 30: The west shaft has been set to cut down large enough for whim and engine-shaft, and plat to cut at bottom, for 26s., by a full pair of men. The adit at Coombe has been set to drive at 40s. per fm., by four men. The water in the old mine is down to the 20, working well.

**MERLLY.**—W. Sandoe, March 30: In the 20, north of shaft, we have a large and promising lode, producing about 6 cwt.s. of lead ore per fm. In the stopes in back of this level the lode is exceedingly large, and producing a large quantity of rather coarse dressing ore-stuff—about 8 cwt.s. per fm. In the stopes in bottom of this level the lode is also large, and worth about 8 cwt.s. of lead ore per fm. The dressing, &c., is regularly attended to, and I hope to prepare a small parcel of ore, about 6 tons, for next sale.

**MINERA UNION.**—W. T. Harris, March 31: The cross-cut driving west from the 80, under Brabham's shaft, is progressing with all possible speed; the ground has been very hard for breaking, but to-day we have cut into a large stream of water, which indicates a favourable change. We have commenced to draw the water out of the shaft, for the purpose of sinking it down by the time the cross-cut is completed. In the other parts of the mine there is no alteration to report.

**MOLLAND.**—T. Bennetts, March 30: The lode in the 62 east is 4 ft. wide, producing good stones of grey ore occasionally; set to six men, 2 fms., at 91. 10s. per fath. The lode in the stopes in the back of the 42 east is 6 ft. wide, producing 1½ ton of ore per fath. The lode in the stopes on the north part of the lode, in back of the 32 east, having become poor, the men are now stopping the ends of ground, where the lode is 7 feet wide, producing 1½ ton of ore per fath. set to four men, 2 fathoms, at 31. 10s. per fath.

**MORRIS.**—J. Roach, March 30: The deep cross-cut has not yet reached the lode, but has passed through a branch of fluekan 3 in. wide. A hole has been bored from the north, which is letting out a great deal of water. I believe, from these indications, that we shall intersect the lode in driving from 3 to 4 feet more. The carrier will deliver 20 tons of compact carbonate of barytes at the railway station on Friday next.

**NANGLES.**—J. Rowe, March 22: The lode in the engine-shaft is in course of taking down; it retains its size, 2½ ft. wide, but the ore is not of so good quality; lode worth 60s. per fath. The 96 west is producing stones of ore. The stopes in back of the 96, west of engine-shaft, by four men, at 31. 10s. per fath.; lode worth 10s. per fm. The stopes in back of the 96, east of shaft, by six men, at 41. 10s. per fm.; lode worth 25s. per fath. Bread and Cheese winze is suspended on account of so much water. We have re-set our tin ground. The rise over the 56, east of engine-shaft, on the lode, is worth 40s. per fath.

— Jas. Rowe, March 29: There is no change in the engine-shaft since last Tuesday; the lode is worth 60s. per fm. for the length of shaft, 16 ft. The stopes east of the shaft, in back of the 96, are worth 25s. per fm. The stopes west of shaft are worth 12s. per fath. The 96 west has improved for driving, but the lode is poor. The tin lode in back of the 56 is worth 40s. per fm.

**NANTEOS.**—R. Williams, March 30: The sinking of the shaft is proceeding satisfactorily, and the lode produces some very good stones of ore, but is not regularly settled at the present moment. The eastern end is not so speedy for driving as it has been for some little time; the lode has become more solid and strong, and is of the most promising description at the depth, producing lead, blende, carbonate and silicate of lime, and generally of the elements most favourable to the production of silver-lead. We must press on this end eastward, where, in my opinion, we have strong indications of the lode being found more productive.

**NANT-Y-IAGO.**—James Ranch: The 30, east of engine-shaft, is producing a small quantity of lead and blende; we are expecting an improvement daily. In the same level, west of shaft, the lode is 6 ft. wide, composed of compact carbonate of lime, traversed by strings of lead and blende—a very fine lode, but at present not of much commercial value. Indications lead us to believe that it will soon be rich for lead ore. In the winze under the 20 west the lode is 4 feet wide, composed of lime and branches of lead ore, yielding 10 cwt.s. of the latter per fath. The rise against the winze, in the 20 west, is producing a few cwt.s. of lead and ½ ton of blende per fm. The stopes in the back of the 20, east of shaft, are producing 6 to 8 cwt.s. of ore per fath., and 1 ton of blende.

**NETHER HEARTH.**—W. Vipond, March 25: There is very little change to notice in either forecast this week; the one in the east and west vein is easier, and we shall commence to rise in this on Monday, and hope to meet with ore above us at the random the old men had ore.

**NEW CROW HILL.**—W. Trelease, March 29: The 55 east is without change to notice since last reported on; the south part of it is still looking well for about 1 foot wide, worth 15 or 16 cwt.s. of ore per fath, but the ground is much harder. The north part of the lode is principally mundic and peach, carrying a little ore, not much to value. The cross-cut here referred to in my last has been driven about 2 fms., and in the last few feet a coarse-looking lode has been met with, 2 ft. wide, composed of mundic, capel, quartz, &c., with a little lead intermixed. I purpose driving this cross-cut a few feet further after a little time, as I fancy there is yet more lode ahead. The eastern stopes, in the back of the 55, do not look so well as last reported, especially eastward—worth now about 2 cwt.s. of ore per fm., though it is my opinion the lode here will improve again shortly, as the deterioration seems to be caused by a flaw running all through the stopes, and slightly inclining east. The western stopes, too, at the present moment, do not look so well, showing here and there a little ore—not much to value. I may, however, add here also that it is my opinion the lode will improve again as we get a few feet higher with the stopes. The 45 east is just as last reported, producing spots and occasional good stones of ore, but nothing regular. We have sent off all the mundic to Par—86 tons 14 cwt.s., of 20 cwt.s. to the ton, including water. We are getting on as fast as we can with dressing up the little lead we have for the next sampling. I hope we shall have 35 cwt.s. of best, worth 25s. per ton, though the falling off of the ore in the eastern stopes is against us. I calculate our stampa ore this time will be about 5 tons.

**NEW TRELEIGH.**—F. Pryor, S. Michell, March 26: This being our tutwork and tribute setting, we beg to send you the particulars. The 90, west of Carr's engine-shaft, by four men, at 61. 10s. per fm., the lode in this end is worth from 71. to 81. per fm. The 70, west of the cross-course, to drive by four men, at 82. per fm.; the value of this end is not altered since the meeting, worth 61. per fm. A cross-cut to drive south at the 70 to intersect Wheal Maria lode, west of the cross-course, is set to four men, at 41. per fm. Also a cross-cut in the 60, west of Carr's, to intersect the lode west of the heave; we calculate by driving 5 fms. will reach it; set to four men, at 61. per fm.—Good Fortune: The 70, west of Symons's shaft, by four men, at 82. per fm.; the lode here is looking better, worth 51. per fm. A winze to sink below the 50, west of Symons's shaft, by two men, at 41. per fm.; this winze will lay open tribute ground. We have cleared out some working in the bottom of the 70, between Good Fortune and Symons's shafts, where there is a lode worth 12s. per fm.; we shall commence stopping here at once. The tribute pitches set were six, of which five are at Good Fortune and one at Carr's, at an average tribute of 11s. in 12.

**NEW WHEAL MARTHA.**—H. Rickard, March 31: We have nothing new to advise you of in our underground operations since last reported. We are busily engaged dressing and preparing for the next sampling, which we hope will be a good one. Weighed off January and February ores at Calstock on Monday last—581 tons 1 cwt. 2 qrs.

**NEW WHEAL ROSE.**—J. Middleton, March 31: We have cleared and secured the adit level, and have put in tortions, and made it complete to the adit level. It is a pleasing duty to say, in clearing out the winze, which is about 2 fms. deep and 20 fms. south of the shaft, we have a lode from 2½ to 3 feet wide, with a leader of lead, mundic, and gossan, 1 foot wide. It has often been said old mines if re-worked will produce good lodes, but when explored fall short of what has been predicted; we are happy to say such is not the case in this instance; and although the accounts seemed too flattering to give full credence to them, we are happy to say we now realise more than was predicted, and I hope it will continue.

**NORTH BASSET.**—G. Davey, March 30: We have been engaged drawing up the pit-work from the eastern part of the mine, and we were very successful in getting away the

two bottom lifts without leaving anything belonging to them under water. On Saturday last, whilst the men were engaged in the 112, removing a portion of the plunger lift, two of them accidentally fell down the shaft 5 or 6 fms.; one of them, I fear, is badly hurt, the other escaped with a few slight bruises and cuts; with the exception of this occurrence, we have got on very well thus far with drawing up the materials. Since my last report most of the tutworkers have been employed night and day at the capstan, consequently there is no alteration in any part of the mine worth notice.

**NORTH BULLER.**—R. Pryor, H. Harvey, March 26: Setting Report: The 100 to drive east of engine-shaft, by six men, at 111. 10s. per fm., in a lode 4 feet wide, producing stones of ore, and letting out an immense quantity of water. The 100 cross-cut to drive south of shaft, by six men, at 141. per fm.; this end is thickly impregnated with mundic, and spots of copper, and, judging from present indications, we cannot be far from the lode. The 78 to drive east of the shaft, by six men, at 71. 10s. per fm.; the lode is 18 in. wide, producing good stones of ore. The 80 to drive west of cross-cut, on King's north lode, by four men, at 81. per fm., where the lode is 15 in. wide, composed of mundic, peach, and spar, with stones of copper ore.

**NORTH CHIVERTON.**—J. Hampton, March 30: The lode in the 20 has improved for blonde, worth 12s. per fath. for that mineral; there is a good branch of lead under this blonde (not 5 fathoms below), but the water is over it for the present; we shall be able to work on it, however, a few days after the engine goes to work. We shall have 40 tons of blonde ready for the market by the end of this week, and in a few days after shall be in a position to sample 50 tons of superior quality. Had there been surface water for dressing purposes (which will be the case as soon as ever the engine commences working) we might have sold 50 tons of blonde long ago, and be dressing another parcel ere now. At the new engine-shaft the indications become stronger and better as we go down, and I am thoroughly convinced that most satisfactory sales of lead and blonde will be the result of our operations, especially as we may look at our good neighbours, and witness their prosperity under very similar circumstances.

**NORTH DEVON.**—J. Blamey, March 29: The sale of 21 tons of ore realised 27s.

The masons will finish the wheel-pit to-morrow, when we shall begin fixing the wheel. At our setting on Saturday next I propose putting on four additional men to begin sinking a pitch from the 20 to the 30, in a lode worth more than 30s. per fm. The lode in the 30 is 3 ft. wide, producing some ore, and very promising to make a good lode; this end is not home to the shot of ore gone down below the 20 by many fathoms. The stop in back of the 20 still yields about 1½ ton per fm. On Thursday we took out a solid stone of ore, weighing nearly 4 cwt.s. We shall begin enlarging the dressing-floors next week.

**NORTH DOLCOATH.**—J. Vivian, J. Paull, March 29: We have finished cutting the plat, and sunk the engine-shaft about 6 feet below the 70, where the lode is from 2½ to 3 feet wide, composed chiefly of quartz, with a little fluekan, copper ore, and capillary silver. There is no other change worthy of particular remark.

**NORTH DOWNS.**—F. Pryor, J. Grenfell, March 24: On Saturday, the 85 was set to drive east of King's shaft, by six men, at 91. per fm.; the takers to have for doing sundry work preparatory to driving in that level 71. 10s.; this we calculated, would be done in the course of the present week, but, owing to a breakage in one of our drawing-lifts, which has delayed us three days, it will not be completed before the middle of next week, when the 85 will be pushed on with all possible speed. A winze to sink below the 60, east of this shaft, by four men, at 71. 10s. per fm. A cross-cut to drive south of the main lode in the 60, to intersect a branch, by two men, at 51. 10s. per fm. A cross-cut to drive south in the 50, by six men, at 51. per fm. A rise in back of the 60, east of King's shaft, by four men, at 91. per fm.; this is to communicate with a tribute pitch in the bottom of the 50, and will produce 1 ton of ore per fm. The 60 to drive east of Bennett's shaft, by six men, at 71. 10s. per fm.; this end is presenting a good appearance, and producing good stones of ore. A winze to sink below the 50, west of Bennett's, by two men, at 51. per fm., opening tribute ground. A rise in back of this level, east of said shaft, by two men, at 81. per fm., also opening tribute ground. The 30 cross-cut to drive north of Bennett's, by two men and two boys, at 31. 10s. per fm. The 30 to drive west of said cross-cut, by four men, at 51. per fm., also opening tribute ground. As last reported, we have sold to-day, 142 tons (computed), realised 7821. 1s.

**NORTH LAXEY.**—R. Rowe, March 29: The lode has again been broken down in the bottom of the shaft to-day, and is quite as good as reported in my last, and worth full 2½ tons per fm. The 60 end is obliged to be suspended for a few days until the sinking of the shaft is a little further advanced—this will soon correct itself. We are hastening the drawing-wheel as fast as possible, in order to be ready before the dry weather and a scarcity of water set in.

**NORTH MINERA.**—J. Dunkin, March 29: We are making fair progress in sinking the eastern shaft, the ground is getting harder than it has been, the branch continues of the same character and size, composed of copper, lead, and blonde. In the 25, driving west of the cross-cut, north of the said shaft, the ground is getting more settled, and the lode is producing stones of lead and blende—a very kindly lode, in which I shortly expect an improvement. In the winze sinking under the 15, west of the same shaft, we are sinking by the side of the main branch, and have not taken it down for the last week, when last taken down it would produce 1½ ton of lead ore per fath.

**NORTH POOL.**—J. S. Phillips, J. Pope, March 28: The house for the new 60-inch pumping-engine will be completed in about three weeks. The stand for balance-beam is being built in the meantime by another party of masons, so as to be ready as soon as the engine is erected for pumping the water (by the connection of horizontal rods to the similar beam at Ballarat) from the western wing of the old mine, which will enable us to sell copper ores soon after, and develop the extensive unwrought lodes to deeper levels. The surface men are raising stone from the old engine-house and quarry, so as to supply the masons as required. The cross-cut has been driven about 6 fathoms north of the engine-shaft, and is being continued at 6 ft. per fath. The end is more watery, and shows evidence of proximity to the lode. The adit level from Ballarat shaft has been re-set at 61. 10s. per fath.; the lode is small, but appears to be opening larger, and is more sparry and mineralised. The pitmen, sawyers, carpenters, and smiths are preparing the various work for the pumping gear required for both shafts.

**NORTH ROSEWARNE.**—J. S. Phillips, J. Tyack, March 28: The deep adit level is being driven to the cross-course, and on it towards the engine-shaft, at 31. per fm., and from the easy ground great progress is being made. The adit level on the No. 3 south lode is being extended west at 41. per fm., in a very promising lode for copper at deeper levels. We have about 2 fms. more to be driven to attain the cross-course, and it is very probable that copper ore may be discovered on its sides in shallow chinks from deeper deposits of mineral.

**NORTH TRESKERBY.**—R. Pryor, J. Tregoning, T. Jenkin, March 31: We have not yet cut the caunter lode in the 100 cross-cut north, but the ground has become a little more favourable for driving. We have set another cross-cut at the 67, the drive north of Highburrish shaft, to cut this lode, and we expect to intersect it in about 6 or 8 fms. further driving. The lode in the 57, west of cross-cut, on caunter lode, has been a little disordered, but is again improving, and is now worth full 1 ton of ore per fm. Treskerby's shaft is down a little more than 7 fathoms below the 90, and the lode continues just the same as when last reported on; but we are glad to say the ground is improving, which is a good indication of an early improvement. No time will be lost in completing the sinking of this shaft to the 100, so as to get under the run of ore driven through in the 90 east and west of shaft. The lode in the 90, east of shaft, is at this time hard, and not of much value. The lode in the 77, east of shaft, is looking better, and producing some rich copper ore, with a good appearance. All other bargains are without change to notice since our last report.

**NORTH WHEAL ROBERT.**—W. Godden, March 31: Murchison's Shaft: In Elliott's cross-cut south, at the 52 fathom level, we have intersected a cross-course and a lode, about 18 in. wide, composed of capel, quartz, mundic, and copper ore. The No. 1 south lode, east of Heard's rise, is 18 in. wide, yielding saving work. The lode in Bennett's stopes, west of Heard's rise, is worth 1 ton of ore per fath. The lode in Scobie's rise, above the back of the 30 fathom level, is worth 1½ ton of ore per fath. The No. 1 lode in the 62 end, west of the Trial shaft, is about 3 feet wide, and yields saving work. The lode in the 42 end, east of the Trial shaft, is still disordered. The stopes throughout the mine are yielding their usual quantities of tin and copper ores. We sampled, on March 28, 64 tons (computed) of copper ores, and on the 29th we sent away samples of tin to the different smelters (computed) 6 tons; the price per ton of which we expect to receive on Saturday.

**OKEL TOR.**—W. Methereill, March 31: We have not taken down any lode in either the 80, 65, or 50 ends, but we intend doing so the beginning of next week. Pearden's, or western slope, is a little improved since last report. Wilton's, or eastern slope, is without alteration. Toll's, or eastern winze, in the bottom of the 50, is about the same as when last reported on. Northey's, or western winze, not so good. I shall be able to write more fully in the next report of its value.

**OLD HALLENBEAGLE.</**



**WORVAS DOWNS.**—Richard Harry, March 30: In the 60, driving south-east on the canister, the lode is 4 ft. wide, yielding a little tin, and looks promising to improve. The stopes in bottom of the 60, west of sump-wins, are worth 9d. per fm. In the rise over the 20 west the lode is worth 8d. per fm. In the winze sinking below the 10 east the lode is about 6 in. wide, at present poor for tin, but not unkindly. Other points of operation on the engine lode continue much the same as for some time past. In costeaming the eastern ground we have succeeded in cutting a fine looking east and west lode, underlying south about 6 in. In a fathom, we shall commence sinking a new shaft on this lode immediately, which will be forced down by nine men as fast as possible; the lode is easy for working, and the ground about it is everything that can be desired for the production of tin ore; therefore, we consider the chances of success are very favourable.

**YARNER.—E. Barkell,** March 30: We have not done much in the 50 fm. level west during the week; the water has been in two days, and the men have been sampling. The winze sinking below the 40, west of shaft, is being pushed on as fast as possible; the lode is yielding saving work, and still carrying a good south wall. The stope in the back of the 40, west of shaft, is worth 3 tons per fm.; and the pitch in the back of the 30, east of shaft, 2½ tons per fm. The sinking of the shaft below the 30, on north lode, is also being pushed on, but no improvement in the lode; it still maintains its size, and is well defined. We sampled at Teignmouth to-day (computed) 92 tons—the sample looked pretty well.

#### MINING NOTABILIA.

[EXTRACTS FROM OUR CORRESPONDENCE.]

**WHEEL GRENVILLE.**—The new tin lode has been intersected in the 110, but as it will probably take some days to cut through it, no value can at present be put upon it. So far, however, it more than realises the agent's expectations, and there is every probability of its proving very productive when opened up.

**VIGRA AND CLOGAU COPPER MINING COMPANY.**—The directors have declared a dividend of 11. 10s. per share, for the quarter ending March 25; and, in accordance with the opinion expressed at the general meeting, on Feb. 25, the directors, with a view to provide capital for the extension of present and the erection of new works, have made a call of 1½s. per share, to be deducted from the dividend above ordered.

**NORTH DEVON (Silver-Lead).**—After long and patient waiting, success appears likely to crown the determined efforts of the adventurers in this mine, which is under good practical management, with a committee who look sharply after the expenditure, buying all materials for cash, and all costs charged up. The mine has latterly greatly improved, so that it is necessary to erect a water-wheel and crusher to reduce the increasing quantities of ore, which is becoming richer every parcel sold.

**EAST WHEEL LOVELL** continues to look well. The lode (north lode) in the shaft, now down 9 fms. below the 26, has improved, worth from 110d. to 120d. per fm., for its length. A winze will shortly be commenced on the south lode from the 20, worth from 60d. to 70d. per fm. The two months' profit will be about 6500/- to 7000. The shares this week have advanced to 11½d., 12, and it is the opinion of many near the mine that they will go to a very high figure.

**CHIVERTON CONSOLS** was started last November under favourable auspices, and the discoveries were so important as to warrant the immediate erection of an engine. Steps were taken for that purpose, and the mine was about to be prosecuted vigorously, when the promoters of North Chiverton laid claim to an important portion of the sett. The dispute has been settled by the right of Chiverton Consols being admitted, and by the addition of a large and most valuable piece of mineral ground to the previously existing sett. Awaiting the settlement of the dispute, operations were still carried on, and have led to the discovery of no less than nine east and west lodes, all of them strongly mineralised, three making lead to surface. One within 9 ft. of the surface producing ½ ton of lead per fathom. The discoveries have created quite a sensation in the neighbourhood. The shares are increased from 5000 to 6000, 11. paid.

**GREAT RETALLACK** seems again likely to attract attention. Large quantities of blends have been raised, and many authorities are of opinion that a large quantity of lead ore will be found in the mine sooner or later. Two lodes have lately been cut, both containing lead, at only 12 fms. from surface, and another lode is expected to be cut soon; the agents consider these lodes will be productive at a deep level. Should this prove the case, the shareholders will be amply repaid for their patience and outlay. I understand, from a circular lately issued, that this mine is situated in the parish of Perranzabuloe. If so, it ought to create special interest, as the celebrated West Chiverton is situated in the same parish, and who knows but what Retallack may in depth become a rich mine.

**WHEEL ELIZA.**—This mine was formerly worked under the name of Boscudine, but from the leases being forfeited, the present adventurers took up part of the Boscudine sett, and are now working under the above name. In less than 12 months a 66-in. cylinder engine has been erected, and the mine forked to the bottom, 102 fms. below adit. The first sale of tin, near 11 tons, was made on Saturday last.

**WHEEL GRENVILLE** is opening out well—indeed, far beyond the most sanguine expectations. The aggregate value of the ends is above 130d. per fathom. One point has improved in the last week from 35d. to 70d. per fm., and daily expecting to cut a productive lode at the 110 fm. level. The district is undeniably, and Wheal Grenville may be fairly said to be beyond a speculation. The "Cautious Man" has often recommended this mine, and those who took his advice will have reason to thank him.

**COMPOSITION DEEDS.**—The case of Ildeston v. Jewell came before the Court of Exchequer Chamber on a point which had been decided by the Common Pleas, whose judgment has now been affirmed, to the effect that a composition deed which does not extend its provisions to all the creditors is not binding, under section 192 of the Bankruptcy Act, 1861, on the creditors who have not executed it, and therefore a certificate under section 198 of the Bankruptcy Act, 1861, of the filing of such a deed affords no defence to an action against bailiff who have undertaken to render the debtor.

**PATENTED COMBINATION.**—Where a patent is for a combination, a person who takes a new and material part of the combination, but does not apply it to a similar purpose to that for which it was applied in the patented combination, does not infringe the patent. This was the holding of the Court of Common Pleas in the case of Lister v. Eastwood.

#### WEATHER PREDICTIONS.

TO THE EDITOR OF THE MINING JOURNAL.

SIR,—I think every reader of the Journal must begin to perceive that the spring season of the present year will be as foretold by me—"a cold, wet, late spring." Already do we hear of inundations in every direction, while vegetation, from the cold, ungenial weather, is almost in a stagnant state. Such is the aspect of the season, not only in England, but even in Spain, the South of France, and throughout Europe. Last year at this time all was in a flourishing condition. The Earth showered her bounties upon us. We are now consuming the fruits of the late year, and wasting the riches it gave us: instead of returning them to the soil, we are polluting our streams. This continued *wilful waste* will bring *woeful want*. With a scarcity of grass, how is the farmer to feed his flocks and herds for the market to supply the nation with animal food? Without animal food how are we to live? I gave ample warning of the approach of the present weather, and cautioned our farmers to make the most of their present stores of provisions for their farming stocks. I hope they have taken my advice. On the other hand, let me inform our readers that on the lands irrigated with *town sewage* there will be no scarcity whatever. By May 1, on these lands the first crops of grass will be fit to eat. The cattle and farming stock there will revel in abundance, while on the ordinarily farmed, poverty-stricken land a thousand to one we shall this year hear of the cattle absolutely dying of sheer starvation. No other nation upon earth abounds with the manorial resources that England does, which, if properly applied to the soil, would render us independent indeed; instead of which, we throw away our manorial resources, and thereby render ourselves dependent on foreign nations for our daily bread and our existence. Very shortly we shall hear of prayers in our churches, and days of humiliation for fair weather, but will the fair weather come? No; Nature, in reply, will only point with the finger of scorn to our poverty-stricken soil, and the wasted riches she has given us, and the polluted state of our rivers with that she gave us in the shape of food, and say, "That is not my way of cultivating the soil, or of conforming to the order of seasons." But if the words of reason fail to arouse a nation to action for its own preservation, we must wait the chastisement the order of Nature will surely inflict upon us in the shape of famine. Nature will avenge her broken laws.

In reply to numerous letters, I should advise our farmers to avail themselves of every day of fair weather to get in their seeds. Some fair but variable weather there will be, but do not expect *fine growing weather*. This is the best and only advice I can give, and the farmers must shape their course accordingly.

For the coming week, the weather will be changeable: some frosty nights, and wind more or less strong.

In reply to several enquiries, I beg to state I have issued no printed circulars on the weather whatever, and if any such circulars have been circulated in my name it is a fraud on the public.

26, Throgmorton-street, April 1. GEORGE SHEPHERD, C.E., Author of the "Climate of England."

**M. R. WALTER TREGELLAS, STOCK AND SHAREBROKER,** 12, ST. MICHAEL'S ALLEY, CORNHILL, LONDON, E.C.  
Mr. TREGELLAS strongly recommends the purchase of Santa Barbara Gold, North Shep-herds, and Chiverton Consols shares.

**M. R. JOHN BATTERS, STOCK AND MINING SHAREBROKER,** 13, THROGMORTON STREET, LONDON, E.C., pays particular attention to British Lead, Copper, and Tin Mines, for which he solicits orders to sell or buy, at nett prices.

Mr. BATTERS can recommend one or two mines safe for an early rise of 100 per cent.; reliable information afforded on application.

**JAMES H. COCK, MINE SHAREBROKER AND DEALER,** REDRUTH, CORNWALL.

J. H. Cock, having had 10 years' experience in the mining market, and being thoroughly acquainted with mines and their management, is in a position to advise or do business on the most advantageous terms. Cash or time bargains promptly attended to.

**T. O INVESTORS.—CONSULT MR. GRIFFITH,** 27, LEADENHALL STREET, LONDON, E.C., who ADVISES as to the RESPECTABILITY, VALUE, and PROBABLE PROSPECT of SUCCESS of ANY SCHEME, PUBLIC COMPANY, &c., whether already established or in course of formation.

#### MINING IN THE PROSPER DISTRICT.

A prospectus has already been published in the *Mining Journal* of the West Tremayne Tin and Copper Mine, and, after a careful examination of the sett, Mr. Jehu Hitchins writes that he can, with confidence, recommend it. The engine and boiler are in good repair, and when the mine is drained there is copper ore in the levels to be at once raised, so that it is proposed to issue only 4400 shares at first, which will supply ample capital to get returns. The remaining 2000 shares can then be either issued at a premium or reserved, as may be determined at a general meeting. The adventure is considered to be *bona fide* and legitimate in every respect, possessing merits of no ordinary kind. In Prosper United Mine, to the west, the great elvan course, that traverses the whole length of West Tremayne sett, is making the lodes intersect most productive, yielding 10 tons of ore per fathom. In West Tremayne they have five lodes intersecting this same great elvan, the importance of which cannot be overrated, especially when considered in connection with the favourable terms on which the sett is held—for 21 years, at 1-18th royalty.

It is proposed to work the mine on the Cost-book Principle, which is considered, according to late decisions in the Stannaries, offers equal security to shareholders, without the formalities and expenses of the Joint-stock Companies Act. Considerable quantities of tin and copper ore have been raised from the mine, which is now 20 fathoms below adit, the adit being 20 fathoms from surface and 250 fathoms long. The whole of the work done will be of great value to the present company in saving both time and cost. The reports of the agents who have inspected the property are highly favourable. Capt. John Hendra states that much of the engine lode there is a very fine lode worked on from surface, about 10 to 12 fathoms deep, which yielded rich ores. A short distance north of this is the great elvan course that made so productive the rich mines in the Reilstein and Rosewarne district, and towards which elvan all the lodes yet discovered in the sets are underlying; where they join the adventurers may look for a mass of ore, as it has always proved so to exist in the district. Capt. R. Pearce considers West Tremayne one of the best pieces of mineral ground now idle in the district. Mr. Wm. Hollow regards it as a very fair and promising speculation. Capt. W. W. Martin observes that at the number of productive lodes running through the sett, and the great elvan course underlying towards them, the intersection of which has invariably resulted in large deposits of ore, he can safely say that he knows of no piece of mineral ground in the district now idle that presents such prospects of realising large and lasting profits at comparatively small cost. The sett is extensive, being 900 fathoms in length on the course of the lodes, and 400 fathoms wide, whilst it has the additional advantage that the ground, though easy for driving, will stand without timber, and that the facilities for the shipment of produce are unusually good.

**FRONTINO AND BOLIVIA GOLD MINING COMPANY.**—The allotment has been completed, and the letters will be issued this day. The applications have been more than equal to the number of shares to be allotted. As will be seen elsewhere, the directors have advertised for an efficient staff to proceed to the mines, so that active operations may be forthwith commenced. The favourable opinions expressed by several accredited authorities with regard to the eventual permanence success of this enterprise, when it was first brought before the public, have since been fully confirmed by information derived from various disinterested sources. The superintendent, Capt. Goyen, who has had considerable experience in gold mining, states that the mines can at once return gold, and that the profits will increase as the development of the property is extended.

**DEVON CONSOLS TIN MINING COMPANY.**—The application for shares in this company, to the formation of which we have already alluded, has been very satisfactory. The sett is situated on the south-eastern mountainous ranges of Dartmoor, and is held under leases from the Prince of Wales and Lord Churton for 21 years, at 1-18th dues. The purchase-money for the property, machinery, and leases has been fixed at 5000/-, the whole of which is to be taken in shares of the company. Mr. Josiah H. Hitchins has carefully inspected and favourably reported upon the property. He states that the grants form a portion of one of the richest localities of the Dartmoor great tin mining district, comprising the very ancient Bachelor's Hall, White Works, Nun's Cross, and Alsborough Mines, which have yielded enormous returns. He considers that the mines are, doubtless, some of the once very productive tin mines of Dartmoor, which are yet to be rendered much more profitably productive, by employing adequate capital, skill, and energy to open them out deeper—as in the case of the old Birch Tor and Vitifer Mines, which are yielding very remunerative returns, and promise, with much certainty, to rank before long amongst the best tin mines of Devon and Cornwall. In conclusion, he regards them as offering an unusually good opportunity for the profitable investment of money, and by the employment of a comparatively small amount (say from 5000/- to 6000/-) a very handsome percentage of profit will be realised. The prospectus appears in another column.

**THE AVERAGE PROFITS OF MINING.**—An important statement of facts, proving the success attending continued perseverance in mining enterprise, was made at the recent commemoration dinner of the Redruth Mining Exchange, by Mr. John C. Laney, the Chairman. The usual loyal and business toasts having been disposed of, the health of the Chairman was drunk, and, in acknowledging it, he stated that it was now 41 years since he was first induced to take a share in South Dolcoath Mine, in Illogan; at all events, it was before his marriage, and after he had taken the share he went to her who was now his good wife, and told her what he had done, which was a good deal for a young man in those days, expressing his fears that he should not be able to keep it. She asked him what he was going to sell it for, saying if he could afford to adventure in the mine, he could surely afford to keep it, and accordingly he did not sell out. The result was that he lost 400/- in that mine, which was afterwards stopped. It was subsequently re-worked by the late Capt. Tom Tongue, unsuccessfully, as it was closed again, but he declined to adventure any more in that mine. The next mine that he was connected with was Wheal Basset, in which he took 1-28th part, and held it on for some years, in opposition to the advice of some of his mining friends in Redruth. He had continued to hold shares in that mine ever since, and it had paid him more than 10,000/- in dividends. That money had enabled him to take shares in other mines, until at one period he held shares in no less than 82 mines in Cornwall and Devon. Now, they must be aware that to hold shares in 82 mines, some of which were contributing and others receding, mines was a serious matter to a man who did not possess a large capital to begin with, but he persevered notwithstanding, and he would recommend them all to persevere also. Do not let them be daunted by failure here or there, but persevere, and they might depend upon it that Cornish mining would make the fortune of everyone who so acted. He did not think that he exaggerated when he told them that by Cornish mining he had cleared 40,000/- That was a fact which should prove an encouragement to the young men around him. Had a mining exchange been in existence in Redruth 40 years ago he believed that he should have cleared 40,000/- more than he had done; but in those days there were no facilities for buying or selling shares. Although a man might have calls to pay to the extent of 5000/-, it was with the utmost difficulty that he could then sell a share, whereas now if he wanted to sell shares to the extent of 5000/-, he would only have to say to a dealer sell for me so many shares in such a mine, and in the course of less than 48 hours the thing would be done for him. He again recommended them not to be daunted by failure here and there, but to persevere, and with good agents and good driving north and south in that branch in which they were engaged, he had no hesitation in prognosticating ultimate success.

**ELECTRO-MOTIVE ENGINES.**—Messrs. Storer and Hancock, of Nottingham, have provisionally specified an invention, which consists in thus constructing electro-motive engines:—In a suitable frame they fix a ring of magnets, which are charged with electricity from a battery in the usual manner, and inside this ring of magnets is fixed a circular rack or wheel with internal teeth. Upon a central shaft, to which rotary motion is to be communicated, they fix four or more arms, each of which carries a wheel with six armatures, more or less, free to revolve upon an axis, and upon this axis there is also a toothed pinion gearing into the circular rack. Upon the current being applied to the magnets in proper order the armatures are attracted, revolve on their axes, and carry round the arms and shaft to which they are connected. Power for any purpose required may be taken from this shaft. In some cases they keep the arms carrying the armatures stationary, and drive round the circular rack or wheel, and take the power from it.

**MANUFACTURE OF CAST-STEEL.**—When cast-iron is subjected to the pneumatic process, and deprived of nearly the whole of its carbon, malleable iron is produced. Mr. Robert Musket, of Coleford, has patented an invention, which consists in adding to melted malleable pneumatised iron a quantity of melted refined cast-iron, by means of which addition the said pneumatised iron is at once converted into cast-steel. Refined cast-iron is cast-iron partially decarbonised and purified from silicon, and it may be prepared by various methods. The usual method of preparing refined iron, or finers' metal as it is frequently termed, is by melting pig or cast-iron in the heart of the ordinary refinery furnace, and by blowing air through tuyeres down upon the surface of the melted pig or cast-iron until a considerable portion of the carbon and silicon contained in the said pig or cast-iron has been eliminated. The melted refined iron is then run out and cast into plates or slabs, to be broken up for use. Refined cast-iron may likewise be prepared by partially decarbonising pig or cast-iron whilst in a melted state by the pneumatic process, or refined cast-iron may be prepared by melting granulated pig or cast-iron mixed with about 10 per cent. of oxide of iron in melting pots or crucibles. The refined iron may be produced in any other convenient way. The addition of the melted refined cast-iron to the melted pneumatised malleable may be effected in the refinery furnace, or the pneumatic furnace, or vessel which contains the refined cast-iron may be tapped, and the refined cast-iron run off at once into the pneumatic converting furnace or vessel containing the pneumatised malleable iron; or the refined cast-iron may be melted in melting pots or crucibles, and be then poured into the pneumatised malleable iron contained in the pneumatic furnace or vessel; or both the refined cast-iron and the pneumatised malleable iron may be poured into a heated ladle, or other heated receptacle, and mixed therein. The cast-steel obtained by the mixture of the said refined cast-iron and pneumatised iron may be poured into suitable moulds. He states that the essence of his invention consists in producing cast-steel by adding to the melted pneumatised malleable iron—that is to say, to cast-iron which has been decarbonised and rendered malleable by the pneumatic process—a quantity of melted refined cast-iron, and mixing the said refined cast-iron and the said melted pneumatised malleable iron when both these substances are in a melted state. Melted spiegeleisen, or melted manganese pig-iron, may be added to the said mixture of refined cast-iron and pneumatised malleable iron, but such addition forms no part of his invention.

**THE BLAST-FURNACE SUPERSEDED.**—An invention has been patented by Mr. E. B. Wilson, of Parliament-street, which relates to certain peculiar arrangements of blasting and cupola-furnaces for the smelting of ores and melting of metals, and to the mode of working the same, whereby a considerable saving of fuel is effected, and when iron is operated upon a superior quality of metal is obtained. In applying this invention to an ordinary blast-furnace or cupola, the tuyeres are removed and flues or passages are constructed, spouting into the body of the furnaces at or about the level of the molten metal, for the purpose of taking off the gases. These gases are conveyed through the flues to a tall chimney, and may be utilised on their passage to the chimney for any required purpose. In order to increase the temperature of the furnaces at the gas exits a number of air-holes are made at the part through the furnace walls, which may or may not be supplied with a blast. In some cases it may be advisable to close in the top of the furnace, and provide it with a feeding-hopper or hoppers, and to introduce a blast downwards from the top of the furnace.

\* \* \* With last week's *Journal* a SUPPLEMENT SHEET was given, which contains—a Plan of the Great Wheal Vor District; a Plan of the Devon Great Consols District; Perfection of the Printing Telegraph; On the Ventilation of Mines, by Prof. W. W. Smyth; Economic Life Assurance Society (meeting); the Alexandra Park Company; Atlantic Telegraph, &c.

#### The Mining Market; Prices of Metals, Ores, &c.

METAL MARKET—LONDON, APRIL 1, 1864.

COPPER.	£ s. d.	BRASS.	Per lb.
Best selected... Tough cake... Tile ... Burns Burns ... Copper wire ... ditto tubes ... Sheathing & bolt, p. lb. ... Bottoms ... Old (Exchange) ...	106 0 0 — 103		

APRIL 2, 1864.]

## THE MINING JOURNAL.

castles, have undertaken its formation. On the Tyne Limited Liability companies are likely to be as numerous as private firms. Two or more shipbuilding firms are about to join and form themselves into a limited company, and a large firm, with furnaces, rolling-mills, ship-yards, &c., is about to follow suit.—ROBERT STEPHENSON AND CO.

**NEW YORK, MARCH 9.**—The demand for domestic coal is good, and prices favour the seller; the consumption is large, and we are without accumulation in our stock; sales from yard at \$7.50 to \$9.75 per ton. Foreign is quite scarce and much wanted at higher prices. Refined ingot copper is in moderate request and very firm at 42½ c. per lb.; 41 c. for Baltimore, and 40½ c. cash for Bergenport. Scotch pig-iron has advanced in sympathy with gold, and small sales are making at \$52 to \$53 per ton; but 200 tons Gartsherrine have been sold from ship at \$50 to \$51 per ton. American pig-iron is also advanced, and prices are unsettled owing to the violent rise and rapid fluctuations of gold; sales of 1000 tons at \$49.50 at \$50, delivered at Elizabethport and Philadelphia. Blooms are firm and in request at \$120 for prime, and \$80 to \$100 for common, delivered at Burlington. English rails are in good demand and are firm; sales of 2000 tons at \$25, now held higher. Other kinds are scarce, quiet and firm; sales of 30 tons No. 1 scrap at \$60, ex ship.

**BOSTON, MARCH 9.**—The transactions in English Cannon coal continue to be confined to small lots, at \$15 to \$17 per ton cash. Picton and Sydney are steady at \$3 to \$8.50 per ton, cash. Antracite steady retail sales at \$11 to \$12 per ton. The stock of pig-iron is very much reduced, and very extreme prices have been paid for small lots. The sales have been in small lots at \$52 to \$54 per ton for Gartsherrine and other kinds Scotch No. 1; and American at \$50 to \$54 per ton, as to quality. Bar iron is selling at full prices. In Russian sheet prices are nominally the same.

We generally look for a dull time in the MINING, as in other MARKETS, during the Easter holidays, but this year has proved an exception, as a large amount of business has been transacted since our last, and the heavy settlement of the fortnightly account, on Thursday, passed off well. The chief business has been in Wheal Grenville, Great Wheal Busy, Great Wheal Vor, Great Laxey, Sithney Carmeal, West Wheal Metal, Wheal Seton, East Caradon, Prosper United, East Lovell, Nangiles, Wheal Crebor, South Condurrow, Wheal Trelawny, Pendene, St. Day United, Tin-croft, Wheal Fortune, Clifford Amalgamated, Grylls Wheal Florence, and a few other mines. Wheal Grenville shares have excited the most interest, and, after very large transactions up to \$4.90, leave off \$4.9. On Thursday a telegram was received at the office to the effect that the tin lode had been cut good in the 110. East Grenville shares have also been demand, and will, doubtless, move up with Grenville, at 2½. 3½. East Caradon shares have advanced to 32, 32½, and in demand; the 50 east, on the north part of the counter, is worth 25½ per fm.; the 60 east, 10½; the 80 east, 20½; the 80 west, from 20½ to 25½; the south lode, in the 70 east, 25½; and the 70 west, 10½ per fm. The ends, in the aggregate, are now worth 132½. Great Wheal Busy shares have advanced to 61. 6½; the 140 east is worth 10½ per fm.; the 140 west, 12½; the lode at Offord's shaft, 30½; the 130 east, 30½; the stope in back, 40½; the 70 east, 12½ per fathom. East Basset, 68 to 70; at the meeting the accounts showed a profit of 965L 11s. 7d. on two months, and a balance in hand of 545L 7s. 6d., after payment of dividend of 2½ per share (1024). The ends continue poor, but the pitches for copper and tin are looking pretty well, especially in the eastern part of the mine. Camborne Vean, 2½ to 3½; Cargoll, 38 to 40; Clifford Amalgamated, 36½ to 37½; East Carn Brea, 7½ to 7¾. East Lovell shares have again improved to 11½, 12. East Russell, 4 to 4½; at the meeting a call of 3s. 6d. per share was made. In the 120, east of Homersham's shaft, the lode has proved to be a good course of ore for 30 fms. in length; and the 130 will be pushed on as fast as possible to get under the ore-bearing part of the lode, and which will be accomplished in about five months. Great Laxey, 5½ to 5½; Great South Tolgus, 3 to 3½. Great Vor shares have fluctuated, and leave off 37 to 38. Great Wheal Fortune, 15½ to 16½; Marke Valley, 5½ to 6; Nangiles, 29 to 30; North Crofty, 4½ to 5; North Downs, 35s. to 37s. 6d.; North Roskear, 24 to 26. St. Day United, 9½ to 10; the 184, east of Opie's shaft, is worth 40½ per fm.; the 97, on Garby's lode, 30½ per fm.; the 174, west of Billing's, 10½ per fm.; the 164, 10½ per fm.; at Opie's shaft the lode is worth 50½ per fm.; the stope in back of the 174, 50½ per fm.; the lode at Richard's shaft, 20½ per fm.; the tribute pitches are looking well. East Rosewarne, 3 to 3½; the 75 west is worth 23½ per fm.; the 65 east, 9½; the 65, west of sump, 30½; the winze improving, and worth 24½ per fathom.

Wheal Kitty (St. Agnes), 7½ to 8; the ends are valued in the aggregate at 127½ per fm. Wheal Rose, 47½ to 52½; Sithney Wheal Metal, 5½ to 5½; West Wheal Metal, 4 to 4½; Great North Downs, 4 to 4½; Wentworth, 16 to 18; Chiverton Valley, 5 to 5½; Pendene, 5½ to 6; Prince of Wales, 5s. to 7s. 6d.; Prosper United, 6½ to 7. Grylls Wheal Florence, 3 to 3½; the engineers are busily employed here erecting engine and stamps, and the agent thinks he can at once sink below the deep adit, on a good course of tin, so as to have a lot of tinstuff ready against the stamps are erected, as the junction of the Wheal Grylls lodes takes place in this sett, and will be met with soon after the engine goes to work. The mine, as we have before stated, is a first-class speculation, without the fear of calls. Providence Mines, 42 to 43. Gornamena, 4 to 4½; at the meeting the accounts showed a balance in favour of adventurers of 385L 1s. 9d., and a call of 2s. per share was made. The 90 west is hoisted to the stopes, and the lode is worth 4 tons per fm. The ore sold last week realised 467L 7s. 3d., and the agent hopes to sell 60 tons next sampling. Sithney Carmeal, 6½ to 6½; South Caradon, 455 to 465, ex div. of 6½ per share; South Caradon Hooper, 10s. to 12s. 6d.; South Tolgus, 40 to 42. Copper Hill, 12 to 13; at the meeting, on Monday, the accounts showed a loss on two months of 174L 17s. 1d., and a balance in hand of 64L 15s. 3d. The 80, north of Michell's lode, is shortly expected to intersect Paddon's lode. The 80 west, on Michell's lode, is worth 2 tons of ore per fm.; stope in back, 3 tons. The water having gone down in the eastern part of the mine, many pitches will now be set, which will leave a profit on working. Stay Park, 31 to 33; Tincroft, 19 to 20; Treloweth, 2½ to 2½; West Caradon, 20 to 22; West Chiverton, 82 to 84; West Seton, 205 to 210; Wheal Bassett, 85 to 90; Wheal Buller, 35 to 40; Wheal Chiverton, 12½ to 18; Wheal Crebor, 42s. 6d. to 45s.; Wheal Mary Ann, 12½ to 13½; Wheal Seton, 195 to 200; Wheal Trelawny, 23 to 24. At Wheal Edward meeting the accounts showed a balance against the mine of 462L, and a call of 4s. per share was made. Wheal Hope, 4 to 4½; the parcel of ore (24 tons) sold on the 30th at 21L 5s. per ton. Great Retallack, after reaching 10s., are flatter again at 8s. to 9s. North Shepherds, 4½ to 5½; Wheal Kitty (Lelant), 13½ to 14½.

The Vigra and Clogau Company have this week received 35 ozs. 8 dwt. of Gold, extracted from 3 cwt. 1 qr. 7 lbs. of ore.

The Stock Exchange a moderate amount of business has been transacted in Mining Shares during the week. The following prices were officially recorded in British Mining Shares:—East Caradon, 30½; East Carn Brea, 6½; Great Wheal Vor, 38½, 37½, 38, 37½, 37½; Grenville, 8½, 9, 8½, 8½; North Wheal Crofty, 4½; Chiverton, 12½; East Bassett, 7½; Wheal Seton, 196, 194, 192½, 195. In Colonial and Foreign Mining Shares the prices were:—Cape, 12, 12½, 12½, 13, 13½; Yudanmutana, 3½, 3½, 3½, 3½; Alamillos, ½; Cobre, 33, 34½, 35, 36½; St. John del Rey, 44, 46, 47, 47½, 48; Marquita, ½; United Mexican, 7, 6½; Panuncillo, 1½.

The Financial Corporation has issued the prospectus of the European Central Railway Company, the object of which is to construct a railway, which will form the first link for connecting the North with the South of Europe, and afford the shortest and most convenient route between England and India, China, Australia, &c. The line is to extend from Chiasso, on Lake Como, to Beasca, and the works were commenced on Jan. 18, in the presence of Government officials, and it is mentioned that responsible contractors have undertaken to construct and complete the line for a sum within the amount of the capital, which is fixed at 1,400,000L, in shares of 40L (or 1000 frs.) each; of this 700,000L is to be issued at once, and the remaining 700,000L raised hereafter in shares, bonds, or obligations, as may be deemed desirable. The chair is occupied by Col. Sykes, M.P., F.R.S., the Chairman of the East India Company, and the other members of the board are—Messrs. Cartwright, late Chairman at Bombay of the Commercial Bank of India, and of the Great Indian Peninsula Railroad Company; Sheriff Cave, Godefroi (of Dematios and Godefroi), Gower, Holroyd, a director of the Mercantile Credit Association; J. W. Macle, of Manchester; Thomas Pemberton, a director of the Birmingham Banking Company; Petit-Jean, of Manchester; Propriet. P. G. Van der Byl, and Cornelius Walford, a director of the Financial Corporation. The line forms portion of the route to Brindisi, the distance whence to Alexandria is 800 miles shorter than from Marseilles, giving nearly three days advantage in reaching Alexandria from England, and in July last the Italian Parliament voted 6,000,000 frs. to adapt the port of Brindisi to the India and China trade. The shares bear 5 per cent. interest during the construction of the line.

The progress during the past week of other undertakings recently introduced, the publication of whose prospectuses has been already an-

nounced, is thus reported:—“ Bonelli's Electric Telegraph continues to command 1 to 1½ prem., notwithstanding the powerful opposition that has to be met; the old telegraph company advertising that they will adopt a printing telegraph to secure the continuance of the public patronage, and that a company is in course of formation for transmitting messages at half the rates proposed by Bouelli. No doubt 6d. per message is as low a rate as would be remunerative with existing instruments.—The shares of the Frontino and Bolivia Gold Mining Company have been freely dealt in at 4 to 4½ prem.—The share list of the Rossa Grande Gold Mining Company will be closed on Thursday. Mr. Herbert Hardie, of Manchester, has joined the direction of this company. The shares are quoted 4 to 4½ prem.—European Central Railway, 1½ prem.; Port Augusta and Northern Railway of South Australia, 4 to 4½ prem.

At Camborne Ticketing, on Thursday, 3417 tons of ore were sold, realising 18,981. 18s. The particulars of the sale were:—Average standard, 124½. 2s.; average produce, 6½; average price per ton, 54. 11s.; quantity of fine copper, 228 tons 13 cwts. The following are the particulars:

Date.	Tons.	Standard.	Produce.	Price per ton.	Ore copper.
Mar. 3.	2904	£12 2 0	6½	£5 15 0	£87 6 0
10.	2113	129 2 0	6	5 1 0	83 1 0
17.	5133	131 15 0	5½	4 10 0	81 17 0
24.	3606	125 18 0	6½	5 1 0	81 11 0
31.	3417	124 2 0	6½	5 11 0	83 0 0

Compared with last week's sale, the standard is about stationary. Compared with the corresponding sale of last month, the decline has been in the standard 4½. 10s., and in the price per ton of ore about 5s. 6d.

The following dividends have been declared during March:—

Mine.	Per share.	Amount.
Great General Consols.	£10 0 0	£10,240 0 0
Great Laxey	0 6 0	3,750 0 0
Vigra and Clogau	0 15 0	3,150 0 0
South Caradon	6 0 0	3,672 0 0
Tincroft	0 10 0	3,060 0 0
Great Wheal Vor	0 10 0	2,954 0 0
West Bassett	0 5 0	1,800 0 0
East Bassett	2 0 0	1,024 0 0
St. Day United	0 5 0	1,000 0 0
Wheat Mary Ann	0 10 0	512 0 0
Wheat Jane	0 10 0	256 0 0
Nancy	1 0 0	250 0 0
Total		£30,708 0 0

At South Caradon Mine meeting, on Tuesday, the accounts for Nov. and Dec. showed a credit balance of 6284L 12s. 8d. The profit on the two months' working was 4073L 10s. 10d. A dividend of 30½L (6½ per share) was declared; Messrs. West and Son paid 410L for a 23-in. cylinder whit-ing engine; and 2596L 12s. 8d. carried to credit from recent account.

At Craddock Moor Mine meeting, on Wednesday, the accounts showed a debit balance of 1124L 18s. 10d. The profit on the two months' working was 153L 6s. 4d. Captains H. and J. Taylor and Phillips reported upon the various points of operation; they propose to sell about 280 tons of copper ore for the next two months.

At the Goonozee Mine meeting, on March 23, the accounts showed a debit balance of 577L 7s. 11d. The arrear of calls amount to 221L 19s. A call of 5s. per share was made. Capt. T. Trevillion considers the mine is gradually improving.

At East Jane Mine meeting, on Thursday, the accounts showed a credit balance of 129L 6s. 4d. A balance of liabilities over assets, after charging everything, including remainder of engine and machinery account, was 595L 5s. 6d. A call of 6s. per share was made.

At Durlo Mine meeting, on Monday, the accounts for the three months ending December showed a debit balance of 320L 5s. The loss on the three months' working was 40L 18s. 7d. Capts. Blight and Martin reported that they were employing 20 men and boys on twotwelve, and 40 men and boys, in 18 pitches, at an average tribute of 13s. 4d. in 17, with present price for tin, and from the present appearances they estimate their returns at 20 tons of tin for the quarter.

At the Okel Tor meeting, on March 24 (Capt. C. Coape in the chair), the accounts showed a debit balance of 75L. It was estimated that the sales for the next four months would leave a considerable balance in hand at the next meeting. The ore sales during the last three months realised over 2000L, while the costs for that period amounted to about 1200L. The mine had thus developed itself into a very profitable undertaking. The reports (which were confirmed by Mr. Murray) showed a probable reserve of 8000 tons of copper ore, which was increasing rapidly, as the 50 east was driving in a large and lucrative course of ore, which would, probably, continue for 150 fms. further, as there is a similar course of ore in the neighbouring mine of Gawton.

At Wheal Reeth meeting, on March 23, the accounts showed a debit balance of 318L 2s. 4d. The subject of sinking a new shaft in the eastern part of the mine having been mentioned, and the agents having reported that the time is now arrived when a new shaft should be commenced, it was resolved that it be left to the direction of the committee, and that they present a special report to the next meeting of what shaft should be done, and what is recommended to be carried out, for the consideration and adoption of the adventurers at their next meeting.” Capts. Higgins, Stevens, and Whitburn reported on the mine. “There are 90 men working 36 pitches, at an average tribute of 7s. 6d. in 17, at the present value of tin. The levels in the eastern part of the mine are opening ground that can be advantageously wrought on tribute, and the prospects of the mine continue to be very good.”

At the North Copper Hill Mine meeting, on Monday, the accounts showed a credit balance of 64L 15s. 3d. The loss upon the two months' operations was 174L 17s. 1d.

At the Bedford Consols Mine meeting, on Wednesday, the accounts showed a debit balance of 21L 10s. 7d. A call of 1s. per share was made.

At New Rosewarne Mine meeting, on Tuesday, the accounts for four months, ending Jan., showed a debit balance of 476L 45. 7d. The profit on the working was 148L 8s. 10d. Captains Vivian, George, and Michell reported on the mine. They have already sampled 35 tons of copper ore, and calculate on selling for the first two months about 400L worth of tinstuff; in addition, we shall sample a parcel of copper ore superior to the one alloted to, and shall also sample at the second sampling a very good parcel of tinstuff; therefore, we are of opinion that our next four months' audit will leave a profit. Labourers employed underground, 53 men; at surface, 10 men; boys and girls 25-88 persons.”

At Gonamena Mine meeting, on Thursday, the accounts for November and December showed a credit balance of 388L 1s. 9d. A call of 2s. per share was made. Capt. R. Pascoe reported that the ore sold on Thursday realised 467L 7s. 3d., and that they propose putting in 60 tons for the next sampling.

At Wheal Agar meeting, on Wednesday, the accounts showed a debit balance of 40L. A call of 4s. per share was made. Arrears of calls amount to 418L 2s.

At Great Wheal Busy (special) meeting, on Wednesday (Mr. Fielding in the chair), it was agreed to divide Great Busy proper from Hallenbagge, and to henceforth conduct them as separate adventures. Details in another column.

At the Dale Mine meeting, on Thursday (Mr. J. Procter in the chair), the accounts showed a credit balance of 494L 5s. 6d., exclusive of 40 tons of ore for sale next week, all costs being charged up to the end of February. The Chairman congratulated the shareholders upon having at last reached the end of their difficulties. They had already sold 50 tons of ore, and had 40 tons more, which would be sold in about a week hence. He hoped Capt. Ninnes would be able to fulfil his expectations, by sampling not less than 50 tons per month. Mr. Dunford (in reply to questions) stated that he hoped to make satisfactory arrangements for selling the ore at fair prices on the mine. The average cost for the future would be less than hitherto, as a great deal of extra work had been completed, such as forming fresh dressing-floors, and completing the various matters connected with the sinking of a deep shaft. He had great pleasure in expressing the confidence he felt in the energy of their agent (Captain Ninnes), who had been most indefatigable in bringing about the present state of things. The accounts were received and adopted. A vote of thanks to the Chairman terminated the proceedings.

At the

## ISSUE OF SECOND MORTGAGE BONDS.

PAYABLE IN LONDON.

800,000 dollars (\$180,000) New York Division.—Due in 1881.

1,000,000 dollars (\$225,000) Pennsylvania Division.—Due in 1882.

Secured by a registered mortgage, constituting a lien on the income and all corporate rights, privileges, lands, franchises, plant, and property of the Pennsylvania and New York Divisions of the Railway.

The bonds are redeemable in New York or in London at 4s. 6d. per dollar, and are transferable without stamp or endorsement; 4 per cent. of the gross amount will be drawn yearly in July, commencing in 1845, to be paid off at par in London; interest coupons are attached to the bonds, payable semi-annually, at the Consolidated Bank in London, at the fixed rate of 4s. to the dollar.

The bonds will be issued at 75, viz.—

Bonds of \$100 at £15 15 0, with interest from April 1, 1864.

" 500 at 75 15 0 "

" 1000 at 15 10 0 "

" 1500 at 15 0 0 "

The coupons represent £15 per annum on each bond of \$100 (£225), or nearly 9 per cent.

## TO THE BONDHOLDERS OF THE ATLANTIC AND GREAT WESTERN RAILWAY.

When the first mortgage bonds of the Pennsylvania section of this railway were issued, it was uncertain whether the company would proceed immediately with the construction of the road beyond Akron (in which case arrangements would have been made with other companies for the completing link from thence to Dayton), or at once push forward the whole line, and so keep the command of the traffic.

The business of the portion of the road between Salamanca and Akron, and of the branches, developed so rapidly, being only limited by the supply of rolling stock, that the directors decided to open the railway throughout its whole extent with all possible dispatch. This policy, under their able engineer, Mr. Kennard, has been so energetically carried out that the line is now in operation as far as Gallon, and will be ready for traffic to Dayton on the 1st of May. It has, therefore, become desirable to offer the second mortgage bonds some months earlier than was contemplated when the last issue of bonds was made.

In order, however, that the original subscribers to, or the present holders of, the first mortgage bonds may in no way be prejudiced by this issue of the second mortgage, it is proposed to give to existing holders the privilege of subscribing for these bonds, at the rate of one bond for every two now held, at a concession in price equal to a liberal bonus.

In May the whole system of this railway will be in operation, consisting of—

The main line from Salamanca to Dayton ..... Miles 285

The branch to Cleveland ..... 67

The Franklin branch and the Oil Creek Railway ..... 54

In all about 506 miles, of which 302 have been successfully worked during the winter. On the 1st of May it is intended to run express trains through from New York, via the Erie—Atlantic and Great Western—Cincinnati, Hamilton, and Dayton—and Ohio and Mississippi Railways to St. Louis—1200 miles, in 40 hours, without break of gauge or change of carriages.

The income of the portion of the line opened has reached £30 per mile per week—within one year of the opening of the through route the receipts will be £60 per mile per week—which will give a dividend on the shares exceeding 25 per cent., after providing for all expenditure, and the interest on the whole issue of bonds.

Dividends from 15 to 25 per cent. are not unusual on well-constructed and properly-administered American railways; from the numerous elements of prosperity held by this Atlantic and Great Western, it is believed that the mileage receipts will shortly equal those of the London and North-Western and other leading English railways, whose cost of construction has been four-fold greater.

The Atlantic and Great Western has almost a monopoly of the petroleum traffic—and passes over the most extensive bituminous coal fields in the world, for which an unlimited market is about being opened in Canada—and for its traffic in agricultural products, a leading American authority says, that when some contemplated extensions are made, "10,000 eight-wheeled freight cars and 500 locomotives will not suffice."

The bonds and shares authorised to be issued over the main line and extensions, are:—

	Miles.	1st Mortgage.	2d Mortgage.	Shares.	Total.
New York Division	48 .....	\$1,000,000 .....	\$800,000 .....	\$1,000,000 .....	\$2,800,000
Pennsylvania	91 .....	2,500,000 .....	1,000,000 .....	2,000,000 .....	5,500,000
Ohio	246 .....	4,000,000 .....	4,000,000 .....	6,000,000 .....	14,000,000
Branches and extensions	121 .....	958,000 .....	—	500,000 .....	1,458,000
	506 .....	\$3,458,000 .....	\$2,800,000 .....	\$9,500,000 .....	\$23,758,000
		£1,903,050 .....	£1,305,000 .....	£2,137,500 .....	£3,345,550

The price of issue has been fixed at 70, and the privilege of subscribing will remain open until the 6th of April, for the present bondholders, either directly, or through their brokers. The terms of issue are as follows:—

	5 per cent. on application, being £11 5 0 per bond of \$1000.
10 .....	2d allotment " 22 10 0 " "
15 .....	2d May " 33 15 0 " "
20 .....	16th May " 45 0 0 " "
20 .....	1st June " 45 0 0 " "

£157 10 0

Subscribers have the option of paying the instalments in advance, and will be allowed a discount of 9 per cent. per annum on such pre-payments.

After allotment, scrip certificates will be issued, to "bearer." These certificates will be exchanged for bonds to "bearer" on payment of the final instalment.

The early completion of the works of this great railway justifies the company in making this additional issue of bonds; following the financial policy adopted at the outset, of issuing securities to the public only after the actual progress of the railway has secured the necessary income for providing the interest. There will remain only the second mortgage of the Ohio division to be disposed of hereafter, when the total of the bonded debt will be only £6000 per mile.

Forms of application may be obtained at the bankers; or at the offices of the company, No. 2, Old Broad-street, London, E.C.

Offices of the Atlantic and Great Western Railway Company, 2, Old Broad-street, London, E.C., March 23, 1864.

## ATLANTIC AND GREAT WESTERN RAILWAY.

## FORM OF APPLICATION.

To be forwarded to the offices of the company, No. 2, Old Broad-street, London, E.C., after payment of the preliminary deposit to the bankers.

To the Atlantic and Great Western Railway Company.

Sir,—Having paid to the Consolidated Bank (Limited), the sum of £1, I hereby request that you will allot me \$ Second Mortgage Bonds of the Atlantic and Great Western Railway, and I hereby agree to accept such bonds on the terms stated in your circular dated 23rd Inst. I am, Sir, your obedient servant,

Signature ..... Address in full .....

## NUMBERS AND DESCRIPTION OF BONDS NOW HELD.

NEW YORK SECTION.		PENNSYLVANIA SECTION.	
Bonds of \$1000	Bonds of \$500	Bonds of \$1000	Bonds of \$500
Numbers.	Numbers.	Numbers.	Numbers.
Numbers.	Numbers.	Numbers.	Numbers.

\* \$ 30,000 have been cancelled by the operation of the Sinking Fund.

† \$100,000 have been cancelled by the operation of the Sinking Fund.

## BONELLI'S ELECTRIC TELEGRAPH COMPANY (LIMITED).

Registered under the Joint-Stock Companies Act, by which the liability of each shareholder is strictly limited to the amount of his shares.

Capital £250,000, of which 25,000 forms the original capital of the company.

Present issue, £225,000, in 22,500 shares of £10 each.

Deposit, £1 per share on application, and £1 on allotment. Calls of £2 each, at intervals of not less than two months.

DIRECTORS.

The Right Hon. the EARL OF SHREWSBURY AND TALBOT—CHAIRMAN. The Right Hon. LORD OTHO FITZGERALD, S. Carlton Gardens—DEPUTY-CHAIRMAN. ERSKINE BEVERIDGE, Esq., St. Leonard's Works, and Priory House, Dunfermline. JOHN ALFRED CSHOWNE, Esq. (Director of the Imperial Bank), 153, Westbourne-terrace.

HENRY COOK, Esq. (Director of the Tamar, Kit Hill, and Callington Railway Co.). ALBERT COOPER, Esq., Manchester.

FREDERICK ELIN, Esq. (John Elin and Co., merchants), Abchurch-lane.

EDMUND GRUNDY, Esq. (Edmund Grundy and Son, late J. and F. Grundy), Manchester.

WILLIAM HAMILTON, Jun., Esq. (David Hamilton and Co.), Manchester &amp; Glasgow.

CHARLES STEWART, Esq. (Messrs. Robert Barbour and Brother), Manchester.

JAMES THOMSON, Esq. (Chairman of the Madras Irrigation and Canal Company, and Director of the Agric and United Service Bank).

CHARLES TRUEMAN, Esq. (Messrs. Truman and Fry), Gresham House.

WILLIAM HARDINGE TYLER, Esq. (Director of the Agric and United Service Bank). CONSULTING ELECTRICAL ENGINEER.—The Chevalier Galtano Bonelli.

BANKERS.

London ..... The Agra and United Service Bank.

Manchester ..... Manchester and Salford Bank.

SOLICITORS.

Henry C. Elliott, Esq., 5, Sherborne-lane, London, E.C.

Messrs. Earle, Son, Hops, and Oxford, 6, Bond-street, Manchester.

BROKERS.

London ..... Messrs. Johnson, Longden, and Co., 22, Tokenhouse-yard.

Liverpool ..... Messrs. Taunton and Co.

Manchester ..... T. Warner, Esq.

AUDITORS.—Messrs. Coleman, Turquand, Youngs, and Co., 16, Tokenhouse-yard.

SECRETARY (pro tem.)—James Gutierrez, Esq.

OFFICES.

7, ANGEL COURT, CITY.

2A, VICTORIA STREET, MANCHESTER.

2, DALE STREET, LIVERPOOL.

ABRIDGED PROSPECTUS.

The directors of Bonelli's Electric Telegraph Company (Limited) having established a line of telegraphic communication between Manchester and Liverpool, the working of which has proved, even beyond expectation, both practically and commercially, the unrivalled excellence of Bonelli's system, propose to extend their operations throughout the United Kingdom.

Each message is printed by the very act of transmission, in clear Roman characters, and as transmitted is delivered, without further process, to the receiver, thus absolutely excluding all possibility of error between the sender and the receiver.

The automatic nature and simple working of the Bonelli instrument renders it independent of specially trained, and therefore highly paid, manipulators. The charge will be £d. for twenty words.

The necessity to which all other telegraphic establishments are exposed of increasing the staff of operators in proportion with the augmentation of business does not exist, and consequently any increase of business must prove almost absolutely clear profit.

Prospectus and forms may be obtained at the bankers, brokers, solicitors, or secretary, at the offices of the company. Each application must be accompanied with a deposit of £1 per share, which will be returned without deduction if no shares are allotted.

From the date of issue, until the final closing of the lists, the Bonelli instruments may be seen in operation daily from Twelve to Four, at 7, Angel-court.

## MR. GEORGE SHEPHERD, CIVIL, MINING, AND CONSULTING ENGINEER.

Letters addressed 26, Throgmorton-street, London, E.C.

## THE FINANCIAL CORPORATION (LIMITED)

INVITE SUBSCRIPTIONS FOR SHARES IN

## THE EUROPEAN CENTRAL RAILWAY COMPANY (LIMITED).

Incorporated with Limited Liability, under the Companies Act, 1862.

Being the first link for connecting the North with the South of Europe, and affording the shortest and most convenient route between England and India.

China, Australia, &amp;c.

From Chiasso, near the Lake of Como, to Lugano, Bellinzona, and Biasca, with a branch to Locarno, on the Lake Maggiore, in Switzerland, 60 miles. With privilege to extend from Biasca to Lucerne or to Coire.

Concession, 99 years.

Capital, £1,400,000. First issue £700,000, in 17,500 shares of £40 or 1000 frs. each.

The remaining £700,000 to be raised hereafter in shares, bonds, or obligations, as may be deemed advisable.

Deposit on application, £1 or 25 frs. per share, and a further payment of £3 or 75 frs. per share on allotment.

No call to be made at an earlier date than three months from the date of allotment, and no call to exceed £2 per share.

DIRECTORS.

Col. SYKES, M.P., F.R.S., Chairman of the East India Company—CHAIRMAN.

H. D. CARTWRIGHT, Esq., late Chairman at Bombay of the Commercial Bank of India, and of the Great Indian Peninsula Railway Company.

THOS. CAVE, Esq., Sheriff of London and Middlesex.

H. GODEFROI, Esq. (Dematatos and Godefroi), Capthall-court.

R. F. GOWER, Esq., 66, Great Cumberland-street.

G. F. HOLROYD, Esq., 8, Sussex-square, Hyde Park, Director of the Mercantile Credit Association (Limited).

JOHN W. MACLURE, Esq., Manchester.

THOMAS PEMBERTON, Esq., Heathfield Hall, near Birmingham, Director of the Birmingham Banking Company.

WM. HENRY PETT JEAN, Esq., Manchester, Director of the Birkenhead Railway

J. L. PROBERT, Esq., 6, New Cavendish-street.

F. G. VAN DER BYL, Esq., 3, Upper Hyde Park Gardens.

CORNELIUS WALFORD, Esq., Director of the Financial Corporation (Limited).

AUDITORS.

## SWANSEA COPPER ORE WHARVES

Swansea, January 1, 1864.

GENTLEMEN.—We beg to inform you that, in consequence of the retirement of Messrs. W. and J. M. Williams from the copper ore trade, which they have carried on here for so many years past, we have resolved to enter upon that business, and for which purpose we have secured most eligible wharves, on the west side of the North Fleet, where vessels drawing 20 ft. of water can get alongside at all times. These wharves are now being covered in, and, together with a steam crusher now erecting, will, we expect, be completed in two or three weeks from this date.

The business we purpose carrying on is that of copper ore wharfingers, combined with metal and other general agencies, which will be managed by our Mr. Thomas Elford, and who for 20 years has filled an important situation under Messrs. Williams, Foster, and Co., and for the last eight years has had the entire management of their large copper smelting works, and copper and metal rolling mills, in this locality, as well as that copper ore business of Messrs. W. and J. M. Williams, which we trust will be a sufficient guarantee to our friends that any business they may entrust to our care will be conducted with the most scrupulous attention to secure the best results for their interests.

Soliciting a share of your consignments of ore, regalum, and slab copper to this port, as well as a share of any general business you may have to transact in this quarter,

We remain, Gentlemen, your obedient servants,

ELFORD, WILLIAMS, AND CO.

REFERENCES:—Messrs. Williams, Foster, and Co., London and Liverpool; Messrs. Williams, Harvey, and Co., London and Liverpool; the Glamorganshire Banking Company, Swansea; Messrs. Alex. Bell and Sons, No. 8, Finch-lane, London.

WATSON AND CUELL'S MINING CIRCULAR,

published every Thursday morning, price 6d. or £1 1s. per annum, contains special Reports of Mines, and the Latest Intelligence from the Mining Districts, from an exclusive resident agent; also, Special Recommendations and Advice upon all subjects connected with Mining, and interesting to investors and speculators. A Record of Daily Transactions in the Share Market, Metal Sales, and General Share Lists, &c. Edited by J.Y. WATSON F.G.S., and published by WATSON and CUELL, 1, St. Michael's-alley, Cornhill, N.E. Messrs. WATSON and CUELL have made a selection of a few dividend and progressive mines, which they have reason to believe will pay good interest, with a probability, also, of a rise in value, the names and particulars of which will be furnished on application.

Now ready, price 5s., by post 5s. 4d.,

STATISTICS OF AND OBSERVATIONS UPON THE MINES

OF CORNWALL AND DEVON,

For 1861, 1862, and 1863.

By THOMAS SPARGO, Mining Engineer, Stock and Sharebroker, Gresham House, Old Broad-street, London, E.C.

Just published, price 1s., by post 1s. 1d.,

HISTORY OF THE RISE AND PROGRESS OF MINING

IN DEVONSHIRE,

From the time of the Phoenicians to the present.

By G. CHOWEN.

London: Published at the MINING JOURNAL office, 26, Fleet-street, E.C.

Plates, 8vo., cloth, price 10s. 6d., by post 11s.,

THE MINER'S MANUAL OF ARITHMETIC

AND SURVEYING.

By WILLIAM RICKARD,

Teacher of Practical Mining in the late Mining School of Cornwall, and Principal of the Engineering Academy, 36, Upper Parliament-street, Liverpool.

Truro: Heard and Son—Longman and Co.; the office of the MINING JOURNAL, 26, Fleet-street; of the author, and of all booksellers.

MR. W. FAIRBAIRN'S WORKS ON ENGINEERING, &c.

Now complete, in 2 vols. 8vo., with 18 plates and 322 woodcuts, price 32s. cloth, or each volume separately, price 16s.

TREATISE ON MILLS AND MILLWORK.

By W. FAIRBAIRN, C.E., LLD., F.R.S.

President of the Literary and Philosophical Society of Manchester, &c.

The whole subject is so ably and systematically treated, that we believe there is fully elucidated in Mr. Fairbairn's work, no question connected with millwork upon which the practical man is likely to re-

Mining Journal.

By the same author, 2 vols. crown 8vo., price 10s. 6d. each,

USEFUL INFORMATION FOR ENGINEERS.

THE APPLICATION OF CAST AND WROUGHT IRON TO BUILDING PURPOSES. Third edition, nearly ready.

London: Longman, Green, and Co., Paternoster-row.

ARTS, MANUFACTURES, MINES.

Complete in 3 vols., 8vo., with nearly 2000 wood engravings, price £1 cloth lettered, or £1 1s. 6d. strongly half-bound in Russia; to be had also in 15 parts, price 5s. each.

D. R. URE'S DICTIONARY OF ARTS, MANUFACTURES,

AND MINES.

Fifth edition, chiefly rewritten and greatly enlarged.

Edited by ROBERT HUNT, F.R.S., F.S.S., Keeper of Mining Records, &c.; assisted by numerous contributors eminent in science and familiar with manufactures.

London: Longman, Green, and Co., Paternoster-row.

New edition, with 89 woodcuts, in 8vo., price 6s.

CATECHISM OF THE STEAM ENGINE, IN ITS VARIOUS APPLICATIONS TO MINES, MILLS, STEAM NAVIGATION, RAILWAYS, AND AGRICULTURE:

With Practical Instructions for the Manufacture and Management of Engines of every class.

By JOHN BOURNE, C.E.

Author of "The Artisan Club's Treatise on the Steam Engine."

Of which the fifth edition, greatly enlarged, with 37 plates and 546 woodcuts, may now be had in 4to., price 42s.

London: Longman, Green, and Co., Paternoster-row.

TO ENGINEERS, MILLWRIGHTS, &c.

Lately published, with new illustrations, 13th edition, corrected and improved, to which is added a New Table of Fractional Numbers, 12mo., 5s. cloth,

THE MILLWRIGHT AND ENGINEER'S POCKET COMPANION.

Containing Decimal Arithmetic, Tables of Square and Cube Roots, Practical Geometry and Mensuration, Pumps, Pumping, and Steam-Engines, with Tables of Circumferences, Squares, Cubes, &c.

By WILLIAM TEMPLETON. Revised by S. MAYNARD.

A more useful addition to the engineers' library cannot well be conceived.—*Mechanics' Magazine*.

The present edition having undergone the careful revision of so competent an editor as Mr. Maynard, is worthy of special recommendation.—*Athenaeum*.

Will be found of great use to those for whom it is designed.—*Builder*.

Also, by the same author,

Fifth Edition, with several new illustrations, 12mo., 5s. cloth,

TEMPLETON'S ENGINEERS' COMMONPLACE BOOK: Consisting of Practical Rules and Tables adapted to Factory and Steam-Engines, &c.

Second edition, 12mo., 4s. cloth,

TEMPLETON'S LOCOMOTIVE ENGINE POPULARLY EXPLAINED.

Illustrated by new designs.

London: Simpkin, Marshall, and Co., Stationers' Hall-court.

NEW WORK ON THE VENTILATION OF MINES,

By RALPH MOORE, Mining Engineer.

Glasgow: M. Ogile and Son, Exchange-square.—London: Hamilton, Adams, and Co., Paternoster-row; and the MINING JOURNAL office, 26, Fleet-street, E.C.

CHIVERTON MINING DISTRICT.—A MAP of this celebrated district, embracing the whole of the PERRAN MINES, WILL BE PUBLISHED SHORTLY, by subscription, at 2s. each, coloured and mounted; or 1s. unmounted. Subscribers will be supplied in the order in which they give their names to the author, R. SYMONS, Surveyor, Truro.—Truro, November 26, 1863.

CHIVERTON MINING DISTRICT.—MR. R. SYMONS begs to inform the subscribers to his forthcoming Map that the delay of the publication has arisen from the circumstance that the boundaries of some of the mines are undetermined; as soon as these are settled the work will proceed to completion.

Truro, March 24, 1864.

M. R. BRENTON SYMONS, M.E., has RETURNED from CORNWALL, and will be happy to AFFORD any INFORMATION respecting the CROWN MINING DISTRICT, to which he has particularly directed his attention. The Geological Map of this district will be published very shortly.

18, Hatton-garden, March 3, 1864.

M. R. JOHN H. CLEMENT, F.G.S., &c., CONSULTING MINING ENGINEER, 3, GLOUCESTER TERRACE, CHURCH STREET, KENSINGTON, W.

Reports after inspection on any class of mines, quarries, or collieries in any part of the world. Promotion of companies undertaken, whether for foreign or home mines, quarries, or collieries.

Spanish, Mexican, or South American mines are considered by Mr. CLEMENT as first-rate properties for investment. Norwegian silver and copper mines as second to none.

M. R. CLEMENT began to ADVISE his CLIENTS that he will be ABSENT in SPAIN for the SPACE of FIVE to SIX MONTHS, which may answer to any letters that may be addressed to him. Letters on business to be addressed as usual, which will be forwarded to him in Spain.—March 14, 1864.

M. R. J. SYRES, SHAREBROKER, LEEK, has SPECIAL BUSINESS in Dale, Blue Hills Colliery, Crebior, and Grenville, and invites communications from buyers and sellers.

SOUTH AUSTRALIA.—CAPT. BRYANT (for 16 years second captain of the Burra Burra Mines) is PREPARED to EXAMINE and REPORT upon ANY MINES or MINERAL DISCOVERIES in the ABOVE-NAMED COLONY.

Address, Capt. BRYANT, Kooringa, South Australia.

M. R. WILLIAM REAY, Jun., MINING ENGINEER AND METALLURGIST, has JUST RETURNED from an interesting EXPEDITION to a NEW MINING DISTRICT in BRAZIL, and again places his SERVICES at the DISPOSITION of his FRIENDS and the PUBLIC, to EXAMINE and REPORT UPON MINES or REDUCTION WORKS, especially gold and silver.—Apply personally, or by letter, to Mr. W. REAY, jun., Spread Eagle Hotel, Gracechurch-street, London, E.C.

## NOTICES TO CORRESPONDENTS.

\* Much inconvenience has arisen in consequence of several of the numbers during the past year being out of print, we recommend that the Journal should be regularly filed on receipt: it then forms an accumulating useful work of reference.

IRON MANUFACTURE.—I wish much to communicate with Mr. Joseph Gilbert Martien, who about eight years ago was interested in the pneumatic process of treating iron.

If in England, perhaps he will kindly write—or if abroad, I should feel obliged if some one would forward his address to—Iron PUDDLER, 26, Fleet-street, London.

HARKEHOP GILL LEAD MINING COMPANY.—Can anyone connected with this company give any information as to its present position and prospects?—AN INQUIRER.

MWYNNDY IRON ORE COMPANY.—In our report of the second annual general meeting of this company, in last week's Journal, we omitted to mention the re-election of Messrs. Samuel Gurney, M.P., and John Lancaster, as directors; also the election of Mr. Charles Reynolds, of London and Carlton, as a director. This mine has been now proved to an enormous extent, and with the assistance of the additional capital, and the promising state of the iron trade, there appears to be little doubt that the undertaking will prove a great success.

NEW CONCORD.—Can any correspondent kindly inform me what is doing with regard to the New Concord Silver-Lead and Copper Mining Company, which allotted its shares some months since?—W. E. C.

SOUTHERN DEVON AND CORNWALL RAILWAY.—We cannot publish the letter signed "E. D." Bodmin.

SLATE MOUNTAIN.—I was much pleased in looking through the Mining Correspondence in last week's Journal to find a notice of this company, and to see that the development of the quarry goes on apace. It appears as if fresh blood had been infused into the board of directors, and now that these reports are begun it is hoped that they will be continued from time to time. By a vigorous prosecution of the quarry, under the management of Mr. Fuller, the engineer, it will do well.—WATCHER.

MINIMUM RENTS FOR MINERS.—The letter of "Cornelia" shall appear next week.

MINE MANAGEMENT—NON-PAYMENT OF CALLS.—"J. F." should write to the Chairman of the Mining Exchange, Spread Eagle-court, Finch-lane, E.C. He will then be informed as to the propriety or practicability of adopting his views.

head. In a more national sense, moreover, a line of railway northward from Port Augusta is a matter of much moment. It will not, of course, stop short at a distance of 100 miles; but as soon as this portion is finished another 100 miles will be proceeded with; and as great efforts are making to explore the interior of this remarkable country, there is no telling the extent to which this railway may be carried, and the important link the present project may become in the general intercourse of the colony.

The capital is put down at 300,000*l.*, with a first issue of shares equivalent to 150,000*l.*, but we presume that both sums are merely nominal, for it seems difficult to understand how so much money, even the lesser sum, can be required. The maximum cost of construction is given at 20*000*l.** per mile, which, say for 20 miles, would be 40,000*l.*, and this, when made, will entitle the company to 52,800 acres of land, for which 50*s.* per acre, we assume, could be readily realised in this country, so that the expense of making these 20 miles could be reimbursed from this source, leaving besides 10,000*l.* to 12,000*l.* in hand for proceeding with another section of same extent, and so multiplying itself as the works progress, the original capital in the meantime remaining intact. Sufficient money, therefore, for constructing the first 10 or 20 miles is all that is necessary. To our minds this is the most desirable course to pursue, rather than to construct the line from shareholders' capital, and then to sell or apportion the land. Ample extent of property will remain for this purpose after the railway is complete. If 50*s.* per share were called up, on the first issue of 30,000 shares, ample capital will be at the disposal of the company.

## REPORT ON CORNWALL AND DEVONSHIRE.

[FROM OUR TRURO CORRESPONDENT.]

MARCH 30.—From what I have already said it is evident that the working of WHEAL METAL for the last four years, up to a recent period, had been rather up-hill work. When first taken in hand by the present management the mine was as poor as a mine could well be, having been literally scooped out, without opening any ground, to supply the necessities of the gigantic experiment tried at the old mine. It was with great difficulty that a very few tons of tin per month could be scraped together; and there were not wanting agents in the county, and even in the district, who pronounced that "Wheal Metal was done." A tin mine in the Wheal Vor district, however, is not easily "done," as is shown by the present instance; still, in the face of all the difficulties they had to contend with, I know none to whom greater credit is due than those who have succeeded so completely in opening out the splendid mine now existing at Wheal Metal, which but for their energy, courage, and judgment might have been lost to the county for many years to come. But for the exertions and sacrifices of Mr. George Noakes, the managing director, and of the Messrs. Harvey, of Hayle, with two or three other large shareholders, aided by the untiring energy and excellent judgment of the agents, the mine must have fallen through, for it received no general support either in the district or out of it. The Messrs. Harvey throughout have stood by the mine in a manner almost without parallel—in a manner, in fact, which was deemed almost imprudent. It is understood that at one time the Wheal Vor Company (then including the old mine) owed them 40,000*l.* for supplies; and it is notorious that if it had not been for their pecuniary aid on more than one critical occasion the whole concern must have come to grief. Since the old mine has been abandoned, and the working confined to Wheal Metal, they held for a long period one-sixth of the mine. Messrs. Harvey have long been celebrated for the judgment and pluck with which they carry out their mining enterprises; but even with their heaviest matters they have rarely shown a greater combination of courage and discretion than they have in this case. That the result has been a splendid success I am assured, be a matter of general congratulation among all interested in our Western mines.

But to Mr. Noakes this mine owes not merely its prosperity, but its very existence at the present moment. When no one else believed in it, his faith never wavered, and, seconded by Messrs. Harvey, he succeeded in keeping together a fine body of shareholders, who, without his guidance and hopeful spirit, would inevitably have thrown up the matter four years ago. When Mr. Noakes took in hand the winding-up of the old mine, no case ever seemed more hopelessly desperate, yet, by his judgment and business capacity, he wound-up the whole without sacrifice, and now absolutely brings the shareholders out with a profit from what seemed an inevitable loss of a quarter of a million of money. It must be satisfactory to Mr. Noakes, not merely to know that he has done this, but also to know how thoroughly his services to Wheal Vor have been appreciated by the entire body of shareholders.

To the agents also—including the manager, Capt. Thomas Gill, and the underground agents, Capts. Francis Francis and Stephen Harris—the shareholders owe a great deal, for during the last four years they had to undergo no ordinary amount of labour and anxiety. To take the responsibility of recommending the sinking of Ivey's shaft through 85 fathoms of utterly poor ground was no trifling matter; and the heaving of the lode by the slide, when it was first met with at Metal shaft, 3 fathoms above the 142, was a source of great anxiety. When the latter event occurred the agents considered the lode to be heaved south, and recommended working accordingly; but another agent, a manager of numerous mines, being called in to give his advice, pronounced very dogmatically (as is his custom) that the lode was north, and almost told the agents that they were fools for thinking otherwise. It

Since this transaction the management of the mine has passed under the control of the Wheal Vor agents, and we may now expect to see it prosecuted with the same vigour and judgment as has succeeded in making Wheal Metal the great mine it now is. The two mines are quite touching—indeed, the upper levels to the 50 all run into each other; and there seems no good reason why the same energy and skill that has made the one to be one of the richest mines in Europe, should not get a good result from the other. Of course, mines worth a quarter of a million of money are not to be had for asking—not got without trouble; but certainly the Wheal Vor agents have no mean opinion of Sithney Wheal Metal, inasmuch as they have all recently purchased shares at the present market price: they are particularly sanguine about getting tin near the boundary.

In Sithney Wheal Metal the engine-shaft is down to the 130, just under the slide, but the water is now in the bottom; under the new management this may be expected to be altered, and the sinking of the shaft—or, at least, the driving of the deeper levels—resumed. The shaft was itself sunk in a cross-course, and, consequently, is no trial of the lode; so that a vigorous opening out of the ground is still to be effected. It is a fact that in this mine Metal lode has not been seen below the 60, but an important trial is now coming off in the 95 cross-cut, south from Schneider's, to Metal lode, which is expected to cut the latter lode in 2 or 3 fms. more driving. A cross-cut is also driving south in the 80 to cut Schneider's lode, heaved 12 fathoms back by the great flocken. The mine is well found in machinery and materials.

North and south of Sithney Metal—also on the lands of Sir Samuel Spry—are the sets of NORTH METAL and SITHNEY CARNMEAL; the former on the eastern continuation of the Old Wheal Vor main lodes, and the latter occupying the same position with regard to Great Wheal Fortune, which lies to the south of Wheal Metal. I have more than once in these columns referred to Sithney Carnmeal in connection with Great Fortune, and at present I need say no more on that subject, as the position of the mine is now well understood. NORTH METAL, however, is little known, for it has not been seriously worked within recent times. This is certainly remarkable, for its position seems everything that can be desired. The lodes have been worked by the "old men" continuously along their backs for fully 400 fathoms in length, to (for them) a considerable depth, so they must have had tin in no small quantities. Considering what a mine Old Wheal Vor has been, it is a strong evidence of the neglect with which this district has been treated, that this ground—immediately adjoining it on the east, with the same main lodes, all largely worked to the surface—should never yet have received any modern trial.

#### REPORT FROM NORTHUMBERLAND AND DURHAM.

MARCH 31.—The Coal and Iron Trades remain as last reported. The weather continues extremely cold, which causes a good demand for home consumption. The disturbances among the pitmen at the Monkwearmouth Colliery have at length assumed a serious aspect. On Saturday a deputation of the men had an interview with Mr. Stobart, one of the owners of the colliery, and he informed them that all men to be engaged in future must sign the yearly bond. Those who objected to do so were at liberty to leave the works on April 6. These were the terms offered by the owners. The deputation, therefore, withdrew, and reported the result of their mission at the Union-house, where a general meeting of the men was held. The shiftmen who had signed the bond did not go to work on Saturday, having obtained leave of absence for the day, in order to meet and discuss with the Union men the position of affairs, and to endeavour to come to some arrangement. The meeting, however, appears to have been a stormy one, judging from the result that followed. About noon a large body of the Ryhope men arrived to sympathise with the Monkwearmouth men, and the united bodies formed in procession, and marched up the Southwick-road, having a standard-bearer in front, and a band of music playing lively tunes. Their business was to enter the houses of such men as had already agreed to the terms proposed by the owners, and to brutally illuse the inmates, and this they carried out most fully. One man, named Bedhead, they beat most cruelly in his own house; they also visited other houses for the same purpose, but their career was cut short by encountering the police, with a number of whom they had a most desperate battle, which, however, ended in the total discomfiture of the Unionists, who were driven off the field at the point of the baton, and the retreat was speedily converted into a total rout and wild disorderly flight. Many were wounded severely on both sides, but none killed. It is scarcely necessary to remark that these proceedings are most disgraceful, and cannot fail to inflict much injury on the men themselves. It is, however, only fair to observe that the day's proceedings were conducted entirely by the lowest portion of the men employed at these large collieries. One of the officers was seriously injured about the head, several others were also considerably bruised and marked by the stones, and two of them, named Moffit and Mullins, were seriously hurt. About thirty of the pitmen were laid prostrate by the policemen, and the garments of some of them were dyed with blood. Four of them lay on the fluid unable to stir, and were carried into adjoining houses and attended to. It seems that 350 men have signed the yearly bond, and 55 the fortnightly one, the rest, about 250 hewers, standing out against the resumption of work under the terms of the yearly bond. Generally, the feeling between the employers and employed in North and South Durham has very much improved, and is now most satisfactory, the yearly hirings having been entered into pretty generally, and the men are well employed, and earning good wages. The men in Northumberland are also quiet, and, generally speaking, earning good wages. The strike at Seghill, however, still continues, and at present there is little appearance of its termination.

#### REPORT FROM DERBYSHIRE, YORKSHIRE, AND LANCASHIRE.

MARCH 31.—The Iron Trade is in a very satisfactory state in these counties, and it may be added, from all appearances, that a good summer trade is certain to be done. There are very large orders on hand at the principal works, and we have also a good enquiry for immediate consumption. There is also a disposition amongst merchants to buy for speculation. The demand for railway springs is exceedingly active, as is also the enquiry for railway iron generally. The Coal Trade is still active, and the demand for the London market very great. The South Yorkshire lock-out has occasioned considerable commotion in the district, and several of the owners have given notice to the parties with whom they have contracts that they will not guarantee the supplies in the present state of affairs. Delegates have been sent from the disaffected districts into Derbyshire and Nottinghamshire to solicit aid from the men towards the Union. These proceedings on the part of the delegates have given great umbrage to the coalmasters. The new hall, built by Messrs. E. Walker, Barber, and Co., at Eastwood, near Nottingham, has just been opened. It is intended for working colliers, and will be used for their moral and intellectual welfare.

Before this communication is published, Mr. JOHN HEDLEY, the Government Inspector of Mines for Derbyshire, Nottinghamshire, and Leicestershire, will have retired from his inspectorship. The close of March terminates the official connection. Mr. Hedley has a wide field of labour open for him, and it is satisfactory to know that his future pursuits will be devoted to the further development of the coal and iron trades. Mr. Hedley has a large interest in an extensive colliery property, extending over 3000 acres, near Bristol. He has also been appointed Chairman of the directors of the Park Gate Ironworks, near Rotherham, a very large concern, late the property of Messrs. Beale and Co., which has just been formed into a joint-stock concern. Mr. Hedley is also one of the directors of the Staveley Coal and Iron Company. This company took possession of the works on Lady-day, and they are now engaged in the construction of large quantities of castings, not only for water companies, but for the London Pneumatic Company. Mr. Carr, a gentleman from the North of England, is spoken of as the probable successor to Mr. Hedley.

The rescuing of the 12 men and boys who had been entombed at Spitalwell Ironstone Pit, connected with the Staveley Works, was celebrated on Monday evening by a dinner in the New Dining Hall, provided at the expense of Mr. Barrow, the proprietor. Mr. Barrow occupied the chair, and about 250 sat down. After the usual loyal toast, the Chairman observed that they were assembled to congratulate and sympathise with the 12 miners on their safe escape out of Spitalwell Pit. He was sure that not only the 12 men, but every person in the room, would join him in sincerely thanking all parties that, directly or indirectly, assisted in rescuing the men from their perilous position. He held in his hand a long list of names, whilst their valuable aid on the bank and in the pit, and would mention a few of them who distinguished themselves by most heroic exertions. They had spoken of the volunteers in a warlike sense, and he would now give them the name of a volunteer in the cause of humanity; that volunteer was Richard Coke, who dashed into the water at the pit's bottom up to his chin, to save the lives of his fellow-creatures. His health he proposed with all honours. He was accompanied by a band of tall, bold men, resolved on bringing out the men all safe on their backs. Those men were George Ord, John Ord, Thomas Marshall, John Turton, and George Wright, to all of whom he expressed his sincere thanks; and he could not omit to mention the names of Thomas Emerson and John Gillatt, neither of whom ever left the works from the time of the accident; all had worked as Englishmen could and did work when life was in danger. He had also to acknowledge the great service rendered by his surveyor, Mr. Howard, from the intimate knowledge he possessed of every nook and corner in the workings; and he (Mr. Barrow) would now take the opportunity of expressing his great obligations to his viewer, Mr. Seymour, for the very satisfactory arrangement he made to effect the object in view, and in which he was so thoroughly successful. The great anxiety evinced by Mr. Seymour, and his never leaving the bank for two days and two nights, must show to the numerous pitmen in the collieries under his charge that his great object is to ensure safety to the men, by having all the machinery in proper order, and by having the pits well ventilated; in short, the men can go to work in confidence that every possible means are taken to prevent accidents. He concluded by coupling the names of those who had aided in the rescue with the "health of Mr. Seymour." Upon the health of Mr. Barrow being proposed, the Chairman, in acknowledging, stated that, owing to declining health, he had formed a joint-stock company to continue the works, and that, although now they were not his own, he would act as Chairman, and pursue the spirit of liberality which had hitherto been adopted. He pointed out the evil of strikes, and especially cautioned the men not to listen to dictation of delegates from Barnsley or elsewhere. He would name a circumstance that occurred above 20 years

ago—it was upon his first coming to Staveley. A body of Unionists, thinking he was a greenhorn in the management of a colliery, not only struck for an advance of wages, but demanded other terms that it was impossible he could comply with. They did not know the men they had to deal with. He ordered the engine to be stopped, and let the pit fill with water; they said "Never mind, he can soon pump the water out." He then ordered the engine to be taken down, and the pit to be closed, declaring that coal should never again be drawn out of that pit again; it never has, and, he continued, never shall draw coal again, but he had decided that it should now be made an upcast-shaft for producing still better ventilation in Seymour and Speedwell pits; and the men working in those pits will be benefited accordingly. He wished his people to understand that if they would stick by him he would stick by them, and that was the sort of Union they would have at Staveley.

The applications for Letters Patent include—Messrs. James and Joseph Wild, Dalton, for improvements in preparing and spinning wool and other fibrous substances; Mr. H. Wright, manager of the General Iron Screw Collar Company, for an improvement in construction and arrangement for condensing by external surface the steam used in marine steam-engines; Mr. E. Less, Longton, for improved apparatus to be used in conducting messages, sounds, or signals from one place to another; Mr. J. Warburton, Low Mills, Addingham, for improvements in preparing silk and other waste, such as cop bottoms and hard spinning waste, which had been previously spun or had twist put into it; Mr. Moore, Clough, Whitley, for improvements in reeling and stowing sails; Mr. Ellis Lever, manufacturer of colliery brattice cloth and flexible tubing, for an improved mode or method of fixing hoops in the interior of flexible tubing employed in the ventilation of mines and other similar purposes.

The local stock and share markets have been remarkably quiet during the week, and but little business was done. There is quite a panic amongst the shareholders of the Water Company, owing to the bursting of the Bradford dam.

#### REPORT FROM NORTH AND SOUTH STAFFORDSHIRE.

MARCH 31.—The Preliminary Meeting of Ironmasters was held at Birmingham; there was a good attendance, and, as anticipated, it was unanimously agreed to retain present prices, which are—Bars, 9t. 10s.; hoops, 10t.; and plates, 11t. per ton at the works. Opinions differ as to the prospects of the ensuing quarter, but careful enquiry shows that rather more orders have been given out lately, and there is a strong belief that the leading merchants have very extensive orders, which they have for some time held back, in the hopes of buying at lower prices. It will be seen within the next week or two whether to-day's decision will bring out orders. It is pretty clear that the Belgian makers are now full, and it is said they will not quote for delivery before May. In Wales and Yorkshire, too, accounts indicate that there are considerable specifications in hand, and there seems reason to anticipate that South Staffordshire must get a good share of the forthcoming orders. Wages and material are now so high that present prices do not yield a larger profit than was made prior to the addition of 50s. to prices. Coal, however, is a shade cheaper than it was. Pig-Iron is not yet selling to any great extent, but in the course of the next fortnight probably a good deal will change hands. Prices are easier than at the beginning of January, but there is less giving way than was expected a little time ago.

The enquiry as to the cause of the recent boiler explosion at Hall End, near West Bromwich, by which 12 men were killed, concluded at half-past one o'clock on the morning of Good Friday, when the jury returned a verdict of "Manslaughter" against Mr. Johnson, the proprietor of the works, his eldest son, Mr. William Edward Johnson, to whom it was stated in evidence that specific complaints of the dangerous state of the boiler, from corrosion of the plates, were made as far back as 1861, and the engineer, Wm. Bagnall, in charge at the time, who said he had been long aware that he was working in daily danger of his life, and, of course, of the lives of all at work. Evidence was called to prove, and did clearly prove, that the boiler was repaired by the men of Granger, the boiler maker, as late as 1862, if not 1863, and it was doubtful whether the warning as to the weak plates was not given at one of these later dates. Again, it was not clear that the plates so indicated had given way. As the verdict was given on Good Friday morning, it is suggested that it is not legal. It certainly appears desirable that a full and careful enquiry should take place as to the culpability of the persons implicated. Past experience does not, however, give very strong grounds for such an anticipation, as in several recent cases in which coroner's juries have committed persons for manslaughter, either the bills have been ignored by the grand jury, or the charges have been quashed after hearing one or two witnesses. The great point is that no one is bound to prosecute, and that, consequently, a little activity on the part of the friends of the accused suffices to procure an acquittal. What may ever be the opinion as to the culpability of any of the persons committed for trial, the case clearly proves the great importance of an inspection of boilers by some one who has no other object than to consider whether there is danger to human life. Persons in charge are apt, day by day, to defer making repairs, until the neglect results in a fearful sacrifice of life. The Midland Boiler Association affords the means of making such examinations, and it is pretty clear that had this boiler been inspected the defects would have been pointed out in a manner that would leave no doubt of the guilt of neglect.

#### REPORT FROM MONMOUTH AND SOUTH WALES.

MARCH 31.—In some parts of the district the difficulties with the men are in a fair way of being arranged, while in other parts matters do not appear so promising. The bold course which Mr. C. Bailey, M.P., took in giving one month's notice to all the hands in his employ has had the desired effect at Nant-y-Glo, the men having gone on with their work on Monday at the terms offered by their employer. The Iron Trade, generally, is in a healthy state, and if it strikes and disagreements with the men can be avoided there is no doubt that a remunerative trade will be done during the next few months. The usual activity prevails in every branch of the Coal Trade, and the merchants are, as a rule, full of orders. The colliers are still troublesome, and the system of restricting the get of coal has not been abandoned. There is an average demand for tin-plates. The Avon Vale Colliery has just commenced working, and a considerable quantity of coal has already been sent down over the South Wales Mineral Railway to Briton Ferry. When the other collieries in the neighbourhood are fully developed a very large traffic will be the result on the South Wales Mineral Railway. The new tinworks at Melincryddan, near Neath, were formally opened on Easter Monday, and a numerous company assembled to witness the event. After the machinery had been set in motion the visitors adjourned to Eaglesbush Cottage, the residence of Mr. Phillips, the manager, where a sumptuous champagne lunch was provided. The new works will employ hundreds of hands, and the trade of the district will be materially benefited by the large amount of money that will thus change hands. The Barry Port Smelting Company (limited) are about to commence the erection of new works intended for the smelting of lead and zinc ores. An extensive brickworks is also in course of erection by the same company.

Merthyr Tydyl, the great centre of the iron and coal trades of the district, has spoken on the Track System, and it is evident that the days of truck are not far from being numbered. A public meeting has been held in the Temperance Hall, the chief constable (Mr. Harris) in the chair, and he was supported on the occasion by the principal influential inhabitants of the borough. A deputation attended on behalf of the Blaina defence fund, and after addresses had been delivered by several gentlemen, Mr. Goodfellow moved, and Mr. Stephens seconded, "That having heard from the deputation that even the evil effects of the truck system, it was highly desirable that steps should be taken to put a stop to the evil." The resolution was unanimously agreed to. The Rev. B. Lewis next moved, "That the meeting rejoiced to learn that a movement was on foot to test the legality of truck, and pledged itself to give material aid to the prosecution." This was seconded by Mr. J. W. James, and passed without a dissentient. At the close of the meeting a considerable sum was subscribed in order to carry on the prosecution in the Blaina truck case, which is to be tried this week at the Monmouth Assizes.

It is reported on good authority that proceedings have been commenced against Mr. T. W. Rhodes, proprietor of the Risca Collieries, for not complying with Mr. G. C. Greenhill's award respecting the sinking of a second shaft at the Black Vein Pit. It will be remembered that the jury at the Risca Inquest recommended that a second shaft should be sunk, and the Government Inspector (Mr. Lionel Brough) having moved in the matter, the point was referred, under one of the clauses of the Mines' Inspection Act, to Mr. Greenhill, for arbitration. The proceedings now commenced are for the enforcement of this arbitration, and the case is likely to attract considerable attention.

The Coedcylinder Colliery, Monmouthshire, has been purchased by the proprietors of the Pontnewynddu Forge, and the property will change hands on April 1. This will enable the company to obtain a regular supply of coal and coke for their works.

**THE BLAINA TRUCK CASE.**—At the Monmouth Assizes, on Tuesday, the action "James v. Levick and Simpson" was tried: it was brought by the plaintiff, Jenet James, against Messrs. Levick and Simpson, ironmasters, to recover the sum of 30z. for work done in the service of the said defendants. Mr. Kennedy and Mr. Macnamara appeared for the plaintiff, and Mr. Huddleston, Q.C., Mr. Gray, Q.C., and Mr. Smythies for the defendants. Mr. Kennedy, at great length, opened the case to the jury, and said the defendant, Jenet James, was a tinner, in the employ of the defendants, at 5s. per week. She was paid by the defendants, not in money, but in goods, which was a violation of the Truck Act, which prohibited articles being paid otherwise than in the current coin of the realm. The first and only witness called was the plaintiff, Jenet James, who said she had worked under the defendants for three years, as tinner, at 5s. per week. She only received during the three years 2s. in money. The rest she received from the shop, which was on the defendants' premises. There was a window between the pay-office and the shop, through which the book was passed. Out of her earnings was deducted 4d. per week for the doctor and fund. Her father died and owed the defendants 2s.; he died before he received any pay in the service of the defendants. His debt was stopped out of her earnings. She paid more for things in the shop than she would at any other place. Mr. Huddleston having addressed the jury for the defendants, called Mr. Frederick Levick, sen., who said he was not acquainted with the plaintiff personally. There were two offices at the works. The people were paid monthly, at No. 1, if no advance had been made. If an advance was made they were paid at No. 2, and it was expected that the advance was for things received from the shop. His orders were that all should be paid in money. There were 3000 persons on the works: 500 did not deal at the shop. He never discharged anyone for not dealing at the shop. The window was for the purpose of facilitating communication between the shop and office. He received about 9½ per cent. profit out of the shop. —Walter Mathews, cashier, said he had paid more than 2s. to Jenet James. As a rule, the money paid out soon came back again. He left the defendants' employ in February, 1861. —Samuel Boyne Davis said he succeeded the last witness, and he had been under the defendants three years. He pro-

duced his cash-book, and showed entries of sums paid to Jenet James. He had paid her weekly for three years. He could prove he had paid over 20s.—Cross-examined: His instructions were to pay everyone in money. It was a practice never to give pens. If a workman came for 4s. 6d. he would give him 5s. The money would return to him rapidly. He could not say anything about plaintiff paying her father's debt. —Matthew Howells, Richard James, and Thomas Owen were called, and proved having paid money to the plaintiff. —Elias James, who had managed the shop for eighteen years; the general rule was the man had the goods and then went for the money. The man went to the office for money, and, if he liked, he might have kept it, and not come to the shop and pay for the goods. Many workmen did not deal at the shop.—Cross-examined: Sometimes the shop had not what was wanted. He had known men buy tobacco and give it away for beer. —Mr. S. B. Davies was re-called, and said he had examined the books, and found that he had paid to the plaintiff 2s. 4s. 3s.—F. Levick, jun., said he had examined the books, and could not find that money had been detained out of his wages for his father's debt of 2s. —Mr. Thomas Brown said he had managed the Ebbw Vale Ironworks for a number of years. It was a custom to contribute towards the doctor and fund. This was the custom before the Truck Act was passed. Mr. Huddleston then reviewed the evidence, and maintained that the strict letter of the law had been compiled with, and that the Truck Act had not been infringed, as it was proved beyond a doubt that all the workmen were paid in money. —Mr. Kennedy replied, and characterised the system as nothing less than an attempt to evade the law. He called several witnesses to disprove the evidence adduced by the defendants as to the mode in which the money was advanced. His Lordship having summed up and reviewed the evidence minutely, the jury retired, and after an absence of two hours returned with a verdict that plaintiff had been paid in the current coin of the realm, but with the expectation that the money, or at least part of it, should be spent in the shop. His Lordship directed the verdict to be entered for the defendants, with the exception of 10s. 6d., which had been deducted from plaintiff's wages on account of her father's debt and 5s. rent, upon which he should give the defendants leave to move, if his ruling were objected to. There was another similar case to be tried, which was made a remand, by consent of the counsel on both sides.

The recent arrivals at Swansea include—from Santander, the Clara Novello, with 172 tons iron ore, for R. Cowell, Cardiff; from Coquimbo, the Antonio Vieno, with 2000 bars copper, and 420 tons copper ore, for C. Lambert; from Bilbao, the Emma, with 108 tons iron ore to order; from Caldera, the St. Bernard, with 305 tons silver ore, 164 tons copper ore, 110 tons copper regulus, and 62 tons unwrought copper in pigs, for H. Bath and Son; from St. Sebastian, the Coberto Abberville, with 1905 sacks copper ore, for Manchet, of London, and 780 sacks copper ore, for H. J. Bath; from Cubas, the Pedro Ferrer, with 568 tons copper, and 63 tons copper regulus, for the Cobre Mining Company; from Caldera, the Mexican, with 309 tons copper regulus, 55 tons copper and silver regulus, and 141 tons silver ore (value 7050L), for H. Bath and Son; from Caldera, the Coquimbo, with 363 tons copper regulus, and 177 tons silver ore (value 8850L), for H. Bath and Son; from Cherbourg, the St. Brieux, with 300 tons iron ore, for the Dowles Iron Company; from Hondeklip Bay, west coast of South America, the Croydon, with 500 tons copper ore for Richardson and Co., and 127 bales wool to order; from Callao, the Rose of England, with 600 tons copper regulus, for H. Bath and Son.

#### NEW INVENTIONS.

**PROVISIONAL PROTECTION.**—FOR six months has been granted for the following:—  
W. TAYLOR, W. MOLINEUX, and H. HARRISON, all in the county of Salop.—Improvements in furnaces for the manufacture of iron. Feb. 6.  
W. CLARK, Middlesex.—Improvements in treating and utilising refuse tinned ingots and other combined metals. March 3.

H. COCHRANE, York.—Improvements in moulds for casting metals. March 5.  
W. E. NEWTON, Middlesex.—Improvements in the manufacture or production of barata and strontia. March 8.  
**LETTERS PATENT** have been issued for the following:—  
J. STURGEON, York.—Improvements in machinery for cutting and boring coal and rocks. Sept. 24.  
G. ELLIOTT, Stafford.—Improvements in props and supports for coal and other mineral workings. Dec. 5.  
T. HARRISON, Durham.—Improvements in machinery for puddling iron and steel. Dec. 5.  
**LIST OF SPECIFICATIONS** published during the week:—  
Manufacture of iron and steel, 4d.; working coal and other mines, &c., 10d.; generating heat for smelting, 1s. 10d.; hardening cast-iron, 4d.; manufacture of iron, 4d. L. DE FONTAINEMORE.

**BELGIAN IRON IN SOUTH WALES.**—As showing the introduction into the South Wales district of Belgian iron, Mr. W. H. Forester, of Swansea, writes that he has purchased from the Ougree Iron Company, at Li

## THE MINING JOURNAL.

## THE DEVON CONSOLS TIN MINING COMPANY (LIMITED).

Capital £15,000 shares of £1 each.

Deposit 10s. on application, and 10s. on allotment.

Incorporated under The Companies Act, 1862, whereby the liability of each shareholder is specially limited to the amount of his shares.

## DIRECTORS.

THOMAS BRADSHAW, Esq., Hampton-court.

JAMES BRAID, Esq., M.D., Director of Les Grandes Mines Consolides de Villemagne (Limited).

WILLIAM CREMER, Esq., Director of the Terrico Copper Mining Company.

J. O. MASON, Esq., Director of the London, Birmingham, and South Staffordshire Banking Company (Limited).

B. L. PHILLIPS, Esq., Director of the European Bank (Limited).

GEORGE VESEY, Esq., Director of Les Grandes Mines Consolides de Villemagne (Limited).

LIEUT.-COLONEL WEMYSS, Director of the Haven Silver-Lead Mining Company (Limited).

BANKERS—London and County Bank.

BROKERS—Messrs. Smith and Binney, 5, Angel-court.

CONSULTING ENGINEER—Josiah Hugo Hitchins, Esq.

SOLICITORS—Messrs. Jas. Taylor, Mason, and Taylor, 15, Fenchurch-street, London.

SECRETARY (pro tem.)—Thomas Spillman, Esq.

OFFICES—8, LANCASTER-PLACE, STRAND, W.C.

## PROSPECTUS.

This company is formed for working the extensive tin mines situated on the southern mountainous range of Dartmoor, comprising extensive limits. The leases are held under the Prince of Wales and Lord Churton for twenty-one years from 1863, subject to the payment of 1/-18d. dues only.

The various lodes contained in the property now to be transferred to the company those of the well-known Batchelor's Hall, White Works, Nun's Cross, and Alxborough Tin Mines, which may confidently be expected to yield unusual profits, judging from the rich tin ore which is now seen in the lower levels; these are doubtless some of the very productive tin mines of Dartmoor, which are yet to be rendered more profitably productive by employing capital, skill, and energy to open them out deeper. This will be done, seeing the great success that has attended the deeper working of the old Birch Tor and Vitifer Mines, which promise before long to rank amongst the most profitable tin mines of Devon and Cornwall.

It would be here out of place and unnecessary to enter into minute details to form a correct opinion of the value of this mine, as the accompanying able report of Mr. Josiah Hugo Hitchins, the consulting mining engineer to the Devon Great Consols, is sufficiently conclusive to justify the directors in recommending this mine as a safe and very valuable investment.

The present owners of the mine having expended a large sum of money in putting the machinery in proper working order, and clearing many of the old levels, the directors have made most satisfactory arrangements with them for the transfer to the company of the property, machinery, and leases, for the sum of £20,000, the whole of which is to be taken in fully paid-up shares.

Prospects, with reports, can be had at the offices of the company, or the brokers. Applications for the remaining shares must be made to the directors, accompanied with a banker's receipt for the deposit of 10s. per share, in the accompanying form.

Fig. 16.—A short time having elapsed since I inspected your mining grants, I have had ample time for carefully reviewing and reflecting on all that came under my observation, and it affords me much satisfaction to be able to say that I feel fully justified in holding to the good opinion I then formed of their value, and therefore it is that I submit with great confidence the following very decidedly favourable report:

Although its chief object will be to bring under consideration your mine on the middle lode, which, on account of the important trials already made, and the very good prospects opened out, promises the earliest success, it must not be forgotten that these extensive grants comprise other lodes that are more than probably valuable, to be brought into operation when the profits to be realised by the working of the mine in question shall provide the increased expenditure that it will involve. Fortunately for me, the clear case that I have to submit obviates the necessity of any lengthened statements and explanations for guiding you to a correct comprehension of the matters generally to be brought forward, and the important trials that I shall have to recommend for bringing this mine into a good paying condition at the earliest moment possible. I was pleased to find that you hold these sets (including an area of about a mile square) for the customary terms of twenty-one years, and subject to the payment of one-eighth dues only. It is important that they are so extensive, as they will command the working of the lodes for a mile in length, and to as great a depth as will ever be required. These grants form a portion of one of the richest localities of the Dartmoor great mining district, comprising the very ancient Batchelor's Hall, White Works, Nun's Cross, and Alxborough mines, which have yielded enormous returns. The extraordinary old workings of these mines must be seen to be properly impressed with their great magnitude; and looking at their primitively rude character, it cannot be doubted that their origin dates from a very early period, when efficient mining machinery, means, and appliances were unknown. They are doubtless some of the once very productive tin mines of Dartmoor, which are yet to be rendered much more profitably productive, by employing adequate capital, skill, and energy to open them out deeper—as in the case of the old Birch Tor and Vitifer Mines, which are yielding very remunerative returns, and promise, with much certainty, to rank before long amongst the best tin mines of Devon and Cornwall.

The various lodes of the four celebrated old mines just named traverse the entire extent of your two grants, in which there are also equally extraordinary old workings on the "backs" and "stream works," the tin obtained from the latter (which must have been very considerable, judging from the immense quantity of ground turned over) being nothing more, however, than the superstructural portions of the lodes, which is good presumptive evidence that the lodes in question will be found abundantly productive in depth. These very important old workings and "stream works" are about 400 fathoms north and south of your mining operations on the middle lode. The rock and general conditions prevailing throughout your grants are very desirable—similar to those which the extraordinary old mines just now referred to are characterised, being granite distinguished by a high degree of crystallisation, with neighbouring evans, alterations of soft ground approaching to "growing," which formations are very congenital, and indeed most decidedly favourable to tin districts. Besides which there are cross-courses, and numbers of cross-joints and oblique veins joining the lodes, which act as "feeders" to them, and are much in favour of great and rich ore formations and their holding down to a great depth. The conditions referred to will also admit of experiments and inexpensive trials being made of the lodes. It will undoubtedly prove to be the case that where the cross-courses, cross-joints, and oblique veins are in connection with the lodes, there the most abundantly productive courses of tin ore will be realised. It is now more than ever necessary for satisfying the scientifically-correct mining knowledge of the present day to have an eye to such matters before undertaking responsible and costly mining trials, it being more universally acknowledged that formerly the productiveness of metallic mineral formations depends on such conditions and other pre-requisites, some of which I have referred to. Attention must now, however, be brought to bear in a desirably direct manner on the mine that you are working on the middle lode, which, as before intimated, is the chief object to be brought under consideration in this report, although the important old workings on the other lodes must be taken in hand after a time, as it is the prevailing opinion of all the miners of the district that, when cleared to the bottom, they will open out very productive courses of tin. In advancing the opinion that the working of your mine on the middle-lode deeper and more extensively, in the way that I do recommend, will be attended with profitable results I do not feel the least misgiving. The opening out of this mine has been effected from time to time in the usual way by shafts and levels—that is to say, the engine-shaft and the adit (8 fathoms from surface), the 5, 10, and 20 fathom levels, the engine-shaft being 8 fathoms deep, in all 36 fathoms deep. The adit is driven 230 fathoms, the 5 fathom level 40 fathoms (24 fathoms each way of the engine-shaft), the 10 fathom level 84 fathoms (12 fathoms west and 27 fathoms east of the engine-shaft), and the 20 fathom level 50 fathoms east of the engine-shaft, nothing having been done at this level to the west of the shaft. The adit comes into the mine and takes the lode at the engine-shaft, after a transverse drive of about 40 fathoms from the "lobby" (open cutting), which, from the commencement of the same in low ground, is of very considerable length, all of which matters will, however, be best understood by your plan and section.

This is an old mine, so far as the adit level and the workings between it and those on the back of the lode at the surface are concerned, and must have produced considerable quantities of tin, looking at the great extent of ground taken away, more particularly in the eastern part of the mine towards and beyond Lukye's shaft; the most important old workings, and the most productive tin ground, commencing at about 10 fathoms before coming to that shaft, and continuing for about 40 fms. beyond it. The success of this mine will depend on its being effectively opened out below these old workings, which is the all-important thing to be done. There is not much to be said in favour of the lode, until the two places about 40 fms. to the east of the engine-shaft are reached, where the lode is being sunk on and taken down, and at which points it is showing an entirely different and very greatly improved character, and is besides worth quite 25/- per fm. with every appearance of not only continuing but also improving in depth. The ground and the lode are more broken, cellular, and quartzose, being distinguished also by a much higher degree of crystallisation than anywhere else to be seen in these levels, all the way from the engine-shaft: the lode is placed in 1 to 2 and 3 ft. wide, its linear course being about 10 fms. of west, and declination not 1 ft. in a fm. There being a good lode in both of these 10 and 20 fms. levels, it is very certain that the ground between will turn out a good deal of tin. It is also, in my opinion, of too much importance to be left unproductive, being also intermixed with pyrite—that is to say, quartz in a minute state of crystallisation, my reason for directing your attention to which will be presently seen. The driving of these 10 and 20 fms. levels would be very important, and more than likely to prove very successful trials; the lode in the 20 fms. level, 8 fms. further east than the points just referred to, showing the same promising general character, being in places a good paying lode, and the ground also easy and inexpensive to work, which is a great inducement for the pushing on of this, the deepest and most important level in the mine, with all possible force, for getting in under so soon as possible the extensive, and, no doubt, done, in the fullest confidence that it will open out a long run of very productive tin ground. For the same reasons, and therefore, with the same confidence, I recommend the pushing on the 10 fms. level in an equally energetic manner; this level will be 24 fms. deep when under Lukye's old workings, which will be a capital good trial, but the 20 fms. level will be a better one.

Seeing that there is the same white ground at Lukye's shaft, and prevailing throughout the whole extent of the old workings, as there is in the 10 and 20 fms. levels, in both of which there is a very good lode, it is not being too sanguine to expect that there is a very great length of productive tin ground waiting to be opened out from where the two levels in question are now on to Lukye's shaft, and to the full extent of the old working, 40 fathoms east of the same. It was this that I had in view when just now speaking of the character of the accompanying ground of the lode in the 10 and 20 fms. levels. That there is a great run of productive tin ground to be reached, there is no room for doubting, seeing that for 40 fathoms in length, or more, the lode has been mostly worked away above the adit to near the surface. In addition to which, there were two sinks made in the bottom of the adit some years since by about 8 fathoms (see plan), the depth reached in both being about 15 ft., the lode being also very good in both. There being no machinery to keep the water under control ever since, I have before said that to sink Lukye's shaft for bring the lode under the old workings in question into effectual operation is the all-important thing to do; I still say so, and strongly advise its being done, feeling fully assured that it will not fail to result in great and early success. This is to be easily enough done by a judicious application of your present machinery, and the declination of the lode is just the very thing (not a foot in a fathom) to admit of the shaft being carried down all the way on it, for proving its capabilities in the quickest, most effectual, and at the same time in the cheapest

manner possible, obviating the undesirable delay consequent on transverse drivages in barren ground.

I shall, however, elsewhere particularly submit my views touching the most advisable trials to be made for ensuring the greatest and earliest success of this mine, which matters I need hardly say will always more or less require very careful consideration before being determined upon. There are two large and powerful water-wheels, and the other surface and underground requisites machinery at the mine, for working the same to a much greater depth, and, indeed, carrying on all the operations of the various departments. It is also very important that these grants command such a supply of water as will be quite adequate for pumping, hauling, stamping, grinding, dressing, and finally rendering the ore marketable, while also flows close to where it will be required for all machinery purposes, and where all the dressing operations will be carried on, so that it will admit of being always applied in the most advantageous manner possible. Indeed, your mining properties possess such pianital advantages for expeditions and economic trials and operations generally, as well as facilities for dressing the ores, as are rarely to be met with.

The quality of the tin (the produce of the lodes of these grants) is very good, being worth, at the present market price, £70 per ton; and the ore being free from arsenic, sulphur, or any other deteriorating admixtures, will require no calcining, and therefore, admit of being quickly dressed and rendered marketable at the least possible cost. It is also satisfactory that these grants are within four miles of the main line of railway through the country, affording a cheap transit of the ores, which, together with the short back carriage, will considerably assist the general expenditure. From the foregoing statements it is clear that your mines are not only free from the uncertainty and speculative risk to attend such enterprises, but also that they will, in being carried out in a judiciously energetic manner, soon begin to yield good, steady, and increasing returns, and before long permanently remunerative dividends. In a word, they offer an unusually good opportunity for the profitable investment of money, and by the employment of a comparatively small amount, (say) from £5000 to £6000, a very handsome percentage of profit will be realised.

J. H. HITCHINS,  
Consulting Mining Engineer to the Devon Great Consols Mines.

FORM OF APPLICATION FOR SHARES.

To the Directors of the Devon Consols Tin Mining Company (Limited). GENTLEMEN.—Having paid to the London and County Bank the sum of £1, being a deposit of 10s. per share on shares in the above company, I request that you will accept me that number of shares of £1 each in the said company, and I hereby undertake to accept the same, or any less number that you may allot to me, and to pay the further deposit of 10s. per share on allotment, and request you to place my name on the register of shareholders in respect of the shares allotted to me.

Name in full.....  
Date.....  
Address.....

THE FRONTINO AND BOLIVIA SOUTH AMERICAN GOLD MINING COMPANY (LIMITED).—WANTED IMMEDIATELY, TO PROCEED TO THE ABOVE COMPANY'S MINES, IN NEW GRANADA—

TWO MINE AGENTS.  
TWO BOOK-KEEPERS.  
TWO REDUCTION OFFICERS.  
TWO CARPENTERS.  
TWO SMITHS.

Apply, with testimonials, to Capt. GOTTS, the manager, Park-place, Newton Abbot, Devon; or to the secretary, at the offices of the company, No. 192, Gresham House, Old Broad-street, E.C.; March 31, 1864.

PUDDELLERS WANTED. Apply to Mr. CHARLES PERKS, Rotherham, Yorkshire.

A GENTLEMAN, having a THOROUGH KNOWLEDGE OF CHEMISTRY in its APPLICATIONS TO METALLURGY and MANUFACTURES, WISHES for an APPOINTMENT, in which the above requirements are AVAILABLE. He is also open to give advice to patentees and others on Improvements in metallurgical and manufacturing processes, or the machinery connected therewith.—Address, "Chemicus," MINING JOURNAL office, 26, Fleet-street, London, E.C.

MINING AGENT WANTED, in the NORTH OF ENGLAND, who has had great practical experience in the working of ironstone mines. State salary required, and references.—Applications to be addressed to "W. N.", Gresham Club, London, E.C.

TO IRON MANUFACTURERS.—A PARTY in GLASGOW,

who has an extensive connection, and who could influence a large trade with Clyde shipbuilders, DESIRES a FIRST-CLASS AGENCY for ANGLE and T-IRON, SHIP and BOILER PLATES, and SHEET IRON, or for any of these singly.—Address, "M. A. C." care of Messrs. Anderson and Watt, 64, Buchanan-street, Glasgow.

TO IRON BROKERS.—WANTED IMMEDIATELY, ONE HUNDRED TONS of FLANGE or FLAT BOTTOM RAILS, 36 lbs. to the yard. Also, ONE HUNDRED TONS of  $\frac{1}{2}$  in. SHEET IRON, 7 x 3.—Address, Patent Peat Company (Limited), 84, New Abbey-street, Dublin. State price and day of delivery.

WANTED TO PURCHASE, ONE HUNDRED SHARES in HALLENBEAGLE, and FIFTY in GAWTON MINES, for which cash will be paid on receipt of transfer, signed by the secretary of those mines.—Address, stating lowest price, "O.," Ridder's Hotel, Holborn, E.C.

WANTED, a SITUATION, by a Cornishman, who will be disengaged in about a fortnight, as MINE AGENT and ENGINEER, either in one or both capacities, as may be required. He has filled a situation in both capacities for some years. No objection to go abroad, as he has been some years on the Continent, and talks Spanish. Testimonials, with specimens of drawings, &c., can be produced.—Address, "P. A." MINING JOURNAL office, 26, Fleet-street, London, E.C.

WANTED, a PARTNER who can command £1000, in a COLLIERY (the best house coal) in SOUTH WALES.—Apply to "J. O. U." MINING JOURNAL office, 26, Fleet-street, London, E.C.

WANTED, an EXPERIENCED MANAGER for a SLATE QUARRY, who thoroughly understands the Welsh language. It is desirable that he should have a knowledge of the general character of the slate veins of North Wales. He must be thoroughly competent to superintend excavations and tunnelling, as well as the manufacture of all descriptions of slate. Satisfactory testimonials as to character, qualifications, &c., will be necessary.—Address, "Z. A." care of Street Brothers, 11, Seral-street, Lincoln's Inn, London, W.C.

WANTED, a 24 in. WINDING and STAMPING ENGINE. Particulars to be forwarded to Mr. THOMAS HOLLOW, Lelant, Hayle. March 28, 1864.

WANTED, the FOLLOWING NEW or SECOND-HAND MACHINERY:—A PORTABLE HIGH PRESSURE STEAM ENGINE, from 8 to 10 horse power, adapted for connecting machinery by both belts and gearing. A STEAM CRANE, to lift from 2 to 3 tons from a depth of from 40 to 60 ft., either fixed or portable, and adapted for traversing, swivelling, raising, and lowering by the engine. Also, a small DERRICK CRANE, to be worked by hand, and capable of lifting 2 tons or upwards; and a FEW TONS of NEW or SECOND-HAND BRIDGE RAILS, of from 12 to 14 lbs. per yard.—Offers to be addressed to Mr. F. ENNER, No. 18, Clarence-street, London.

NORTH WALES.—A VALUABLE SLATE QUARRY, with grant of 600 acres upon lease, TO BE DISPOSED OF.—Apply to Mr. H. P. M. OWEN, C.E., Llanbedr, Merionethshire.

DIVIDEND TEN PER CENT. PER ANNUM.—TO BE SOLD, FIVE HUNDRED SHARES (of £1 each, fully paid-up), at par, in the WELLSOMBROOK SLATE COMPANY (LIMITED).—Apply to Mr. RUNDALL, 43, Moorgate-street, City.

TO CAPITALISTS.—The PROPRIETORS of a COLLIERIES in full work, and now producing upwards of 100,000 tons of the best bituminous coal per annum, are DESIROUS of DISPOSING OF THE LEASE they hold. The quantity now worked may be doubled without extra expense, if required. The property is situated within 15 miles, by rail, of the port of Cardiff.—Particulars may be obtained of D. RANDALL, Esq., solicitor, Neath.

TO IRON MASTERS, IRON SHIP BUILDERS, ENGINEERS, &c.—BY PRIVATE SALE, on the RIVER TYNE, FORTY-EIGHT ACRES of FREEHOLD LAND, in the parish of WALLSEND. It is unsurpassed for situation, having a large and deep water frontage to the river, and is intersected by the Tynemouth branch of the North-Eastern Railway. There is a large mansion house, cottages, offices, &c., on the ground, clay for brickmaking, &c.—For particulars, apply to Mr. J. THOMPSON, 5, Dean-street, Newcastle-upon-Tyne.

IMPORTANT TO COAL PROPRIETORS, CAPITALISTS, AND OTHERS.—The OWNERS of VALUABLE MINES of COAL, lying within and under a compact freehold estate of 150 acres, situate about three miles from the important manufacturing town of Blackburn, Lancashire, are PREPARED to treat for the ABSOLUTE SALE of the COAL, or to enter into favourable arrangements for leasing the same for a term of years. Good turnpike roads intersect the estate, and the same is within very easy distance of railway and canal.—For further particulars, apply to Messrs. ROBINSON and Son, solicitors, Blackburn.

SOUTH DEVON RAILWAY FOUR AND A HALF DEBENTURE STOCK.—TO BE SOLD, BY TENDER, £3500 SOUTH DEVON RAILWAY DEBENTURE STOCK, bearing interest at 4½ per cent. per annum until the 1st of March, 1869, and afterwards 4 per cent. in perpetuity.

Tenders for the purchase of the above stock may be sent to the undersigned on or before the 16th day of April next. The proprietor does not bind himself to accept the highest or any tender.

G. EASTLAKE AND CO., Solicitors, 15, Frankfort-street, Plymouth.

THE NEW CORNISH LEAD AND COPPER MINING COMPANY (LIMITED).—Notice is hereby given, that a FOURTH CALL, of FIVE SHILLINGS PER SHARE, has been made by the directors of this company on the shares in the company, No. 8002 to 12,000 (both inclusive), such call to be paid to the bankers of the company, Messrs. Attwood, Spooner, Marshall, and Co., at their banking house, in New-street, in the borough of Birmingham, in the county of Warwick, on or before Tuesday, the 26th day of April, 1864.

By order, J. CHAMBERLAIN BARLOW, Sec.

Office, 39, Waterloo-street, Birmingham, March 28, 1864.

**ANGLO-MEXICAN MINT OFFICE.**—Notice is hereby given, that the ANNUAL GENERAL MEETING of shareholders in this company will be HELD at the office, as under, on THURSDAY, the 8th day of April next, when one director will be elected in the place of H. W. Schneider, Esq., who goes out by rotation, but is eligible for re-election, and will be proposed accordingly. The chair will be taken at One o'clock precisely.

ALFRED GODFREY, Sec.  
5, Broad-street-buildings, March 22, 1864.

**THE ALAMILLOS COMPANY (LIMITED).**—Notice is hereby given, that the YEARLY GENERAL MEETING of the shareholders in this company will be HELD at the undermentioned offices, on THURSDAY, the 7th April, at Two o'clock.

To receive the accounts and balance-sheet, with reports from the directors, auditors, and mining agents, to the 31st December, 1863.

To elect directors in the place of Messrs. J. Addis, Jas. Crosby, Wm. Cox, M.P., Wm. Henderson, Robt. Henty, J. P. Judd, Wm. Loftus Lowndes, Chas. Morris, John Taylor, and R. Taylor, who retire according to the provisions of the Articles of Association, but who are eligible, and offer themselves for election.

To appoint two auditors for the ensuing year.—Thomas Coxhead and F. J. Bramwell, Esq.s., offer themselves for election—and for general business, as authorised by the Articles of Association.

By order of the Board, J. B. COLOGAN, Sec.  
5, Queen-street-place, Upper Thames-street, London, E.C., March 24, 1864.

**FORTUNA COMPANY (LIMITED).**—Notice is hereby given, that in conformity with the Deed of Settlement, the HALF-YEARLY GENERAL MEETING of the shareholders in this company will be HELD at the undermentioned offices, on THURSDAY, the 7th April, at Half-past Two o'clock P.M.

To receive the accounts and balance-sheet, with reports from the directors, auditors, superintendent, and mining agents, for the year ending December 31st, 1864.

To elect three directors in the place of John Addis, Robert Henty, William Loftus Lowndes, Esq.s., who go out of office by rotation, but who are eligible, and offer themselves for re-election.

To appoint two auditors for the ensuing year.—James Thomas Dorington and William Cox, M.P., Esq.s., offer themselves for re-election—and for general business, as authorised by the Deed of Settlement.

By order of the Board, J. B. COLOGAN, Sec.  
5, Queen-street-place, Upper Thames-street, London, E.C., March 24, 1864.

**LINAES LEAD MINING COMPANY (LIMITED).**—Notice is hereby given, that in conformity with the Deed of Settlement, the HALF-YEARLY GENERAL MEETING of the shareholders in this company will be HELD at the undermentioned offices, on THURSDAY, the 7th April, at One o'clock,

To receive the accounts and balance-sheet, with reports from the directors and auditors, for the half-year ending 31st December, 1863.

To elect two directors in the place of John Taylor and Richard Taylor, Esq.s., who go out of office by rotation, but who are eligible, and offer themselves for re-election.

To appoint two auditors for the ensuing year.—Thomas Coxhead and F. J. Bramwell, Esq.s., are eligible, and again offer themselves for re-election—and for general business, as authorised by the Deed of Settlement.

By order of the Board, J. B. COLOGAN, Sec.  
5, Queen-street-place, Upper Thames-street, London, E.C., March 24, 1864.

**THE ROSSA GRANDE GOLD MINING COMPANY (LIMITED).**—Incorporated under the Companies Act, 1862, with limited liability.

Capital, £100,000, in 100,000 shares of £1 each. First issue, 50,000.  
Deposit, 2s. 6d. per share on application, and 2s. 6d. per share on allotment.

No call to exceed 5s. per share, at less than three months.

DIRECTORS.

GEORGE NOAKES, Esq. (Managing Director Great Wheal Vor United Mining Company), Gresham House, Old Broad-street.

E. B. NEILL, Esq., Parliament-street (Consul General for Monte Video).

BARNET L. PHILLIPS, Esq. (Director European Bank).

F. KOE, Esq. (Director London and Birmingham Bank).

R. W. JONES, Esq. (Director British Nation Life Office).

A. SCHOALES, Esq. (Director of the London and Birmingham Bank).

Capt. J. R. HARRIS (Director of Les Grandes Mines Consolides de Villemagne).

C. W. WHITE, Esq., Hibernia Chambers, London Bridge.

HERBERT HARTRIDGE, Esq., 34, Church-street, Manchester.

AGENTS IN BRAZIL.—Messrs. Alexander Fry and Co., Rio de Janeiro.

CONSULTING ENGINEER IN ENGLAND.—Capt. J. Dalley, St. Austell.

BANKERS.

London and Westminster Bank, Lombard-street.

London and Birmingham Bank, Cheapside; and New-street, Birmingham.

SOLICITORS.—Messrs. Hancock, Sharp, and Hales, 20, Tokenhouse-yard.

BROKER.—Francis Burnand, Esq., 78, Lombard-street.

AUDITORS.—Messrs. Cash and Edwards, Tokenhouse-yard.

SECRETARY (pro tem.)—J. J. Truran, Esq.

TEMPORARY OFFICES,—25, POULTRY, LONDON, E.C.

ABRIDGED PROSPECTUS.

The object of this company is to purchase and work an extensive gold mining property, called Rossa (Rocha) Grande, in the province of Minas Geraes, Brazil, estimated as containing about 21 square miles, in the vicinity of the celebrated mine of the St. John del Rey Company. The purchase-money is to be £15,000 in cash, and an equal amount in shares.

Capt. Thomas Treloar, in his elaborate report, says:—“The estate contains three distinct auriferous formations, which can be traced for miles, besides rich jacinths unexplored. Diamonds are said to have been found at one spot. The first rock formation is of white quartz and iron, and has yielded from  $\frac{1}{2}$  to 5 ozs. of gold per ton; the second is of yellow quartz and auriferous arsenical pyrites, and has afforded upwards of six ounces of gold per ton; the third is of quartz and brown oxide of iron, and about 36 feet wide. In depth it will probably graduate into a pyritic rock formation, similar to that of the St. John del Rey Company's mines at Morro Velho. The whole mass of this lode is auriferous, and portions of it have yielded 50 ozavas of gold per ton. It only requires capital, economy, and practical experience to make these lodes as remunerative as the Rock Mine of the St. John del Rey Company,” which has already paid £673,750 in dividends, and one share in which, with £15 paid, is now worth £62.

Reliance is to be placed upon Captain Treloar's report, from the fact that he has had 16 years' experience in Brazil, in the service of the St. John del Rey Company, and is chief engineer to the Don Pedro North del Rey Gold Mining Company, which under his management, has paid a dividend at the rate of 10 per cent. on its first nine months' working.

Captain Dalley, who has long known Rossa Grande, confirms the above report. The late Mr. George Vincent Duval, Brazilian mining commissioner, also, in a work written by him, favourably mentions Rossa Grande, classing it with Morro Velho (St. John del Rey), and says:—“These mines might be aptly termed gold quarries.”

Prospectuses and copies of the reports, with a map, and forms of application for shares, may be obtained by the broker, or the solicitors, or at the offices of the company.

BRAZIL.

**THE ROSSA GRANDE GOLD MINING COMPANY (LIMITED).**—The Directors beg to announce that the LIST OF APPLICATIONS FOR SHARES in this company will be CLOSED on THURSDAY NEXT, the 7th instant, 1864.

By order of the Board, J. J. TRURAN, Sec. pro tem.

Temporary Offices, 25, Poultry, London, E.C.

Monthly, 1s.

**THE MINING AND SMELTING MAGAZINE**, illustrated by plates and woodcuts, will be found the most comprehensive Review of the Practical and Scientific Progress of every branch of Mineral and Metallurgical Industry, and the most complete and Reliable Record of the Mining and Metal Markets, both home and foreign.

London: Simpkin, Marshall, and Co., Stationers' Hall-court.

Now ready, 1s.

**THE MINING AND SMELTING MAGAZINE** for April (No. 28, Vol. V.), containing:—Bachette's New Form of Blast-Furnace, by Dr. L. Beck, of the Metallurgical Laboratory, Royal School of Mines, illustrated by wood-cuts—Improved Mechanical Puddlers, illustrated by a large plate—Winkler on the Assaying of the Ores—Prof. Whitney on Mining in America—New American Stamping Machinery—Treatment of Copper Ores in Carniola—Electrical Signals for Mines—Prof. Haughton on Joint—Welsh and North Country Steam Coal—The Use of Petroleum as a Fuel—Patents relating to Mining and Metallurgy—Bibliography—Review of Mining and Metallurgical Progress all over the World—Record of the Mining and Metal Markets—Tabular Abstract of Mining Accounts—Prices Current—Copper, Tin, and Lead Ore Sales.

London: Simpkin, Marshall, and Co., Stationers' Hall-court.

Now ready, price 5s.

**STATISTICS OF AND OBSERVATIONS UPON THE MINES OF CORNWALL AND DEVON.** For 1861, 1862, and 1863.

By THOMAS SPARCGO, Mining Engineer, Stock and Sharebroker, Gresham House, Old Broad-street, London, E.C.

This work contains the following particulars, viz.:—The geological position, present prospects, name of purser, manager, and secretary, with annual returns of each mine during the last three years, and total dividends paid to the present time.

It is illustrated by a map of Cornwall, showing its parliamentary division, and population; geological district maps, divided into four sections, in which are shown the boundary lines of each parish, height of hills, source of rivers, &c., together with maps of St. Just, St. Ives, Marazion, Gwinear, Chiverton, Bodmin, Liskeard, Devon Great Consols, and Tavistock mining districts, showing boundary lines of each seat, with the lodes, elevans, and cross-courses traversing the same. It also contains longitudinal and transverse sections of the Dolcoath Mine (kindly supplied by Capt. Charles Thomas), with report upon the same; sections of the workings at Botallack, corrected down to the present time by the manager (S. H. James, Esq.), with historical account of same; surface plans and sections of all the leading mines in both counties, with observations upon each, including geological map of the Fowey Consols district (kindly furnished by Major Davis, R.M.), as also all the information necessary for the guidance of those unacquainted with mining.

**PRACTICAL MECHANICS' JOURNAL** for April (Part 193, price 1s.), with a large and highly-finished plate engraving of Mr. W. H. C. Voss's Water Meter, and thirty woodcuts. Original Articles on the Northern Collieries, Ringed Structure in Ordnance, Curtis's Steering Screw Propeller, Spoked and Disc Wheels, the Fracture of Lead, Muntz's Yellow Metal for Covering Public Buildings, the Late Major-General Portlock, R.E., Arsenical Colours, the Mont Cenis Locomotive, Recent Patents:—Naylor, Safety Valves; Charles and Co., Smoothing Iron; Girard, Coating Metals; Appleby, Propelling; Pilbeam, Sewing Machines; Sande, Machine Knitting Needles; Wilson, Blast Furnaces; Smith, Railway Carriages. Law Reports, Reviews of New Books, Mechanics' Library, Correspondence, Scientific Societies, Monthly Notes, Marine Memoranda, Price Current of Metals, Wood, &c., List of Patents, Registered Designs. London: Longmans, 39, Paternoster-row; Editor's Office (Offices for Patents), 47, Lincoln's Inn-fields.

**ASSAYS AND ANALYSES OF EVERY DESCRIPTION** Conducted by JOHN MITCHELL, F.C.S., M.G.A. (Established 20 years). Author of "Manual of Practical Assaying," "Metallurgical Papers," &c. All communications and samples to be addressed (free) to Mr. MITCHELL, care of Mr. P. Clay, 29, Great St. Helen's, London, E.C.

## THE MINING JOURNAL.

### In Chancery.

#### REDRUTH, CORNWALL.

**TO BE SOLD, BY PUBLIC AUCTION**, pursuant to an Order of the High Court of Chancery made in the Cause of Brunn v. Collins, with the approbation of the Master of the Rolls, in Forty-five Lots, by Mr. W. F. Conson (the person appointed by the said Judge), at Tabby's Hotel, Redruth, in the county of Cornwall, on Thursday, April 29th, 1864, at Twelve o'clock at noon, the FEE SIMPLE in POSSESSION of and in SEVERAL EXTENSIVE and VALUABLE MINERAL PROPERTIES in one of the most productive mining districts of the county.

The REVERSION of the greater part of the VALUABLE BREWERY PREMISES, known as the REDRUTH BREWERY, and of certain OTHER FREEHOLD PROPERTIES, comprising altogether about EIGHTY DWELLING HOUSES, SHOPS, WAREHOUSES, BAKEHOUSE, GARDENS, and OFFICES, situate respectively in and near Redruth Highway, Fore-street, North-row, Ford's-row, Shute-row, Park Hamble, Rose-row, Green-lane, the West End, and other parts of and in the town and parish of Redruth, in the county of Cornwall.

Printed particulars and conditions of sale, with plans, may be had gratis in London of Messrs. COODE, KINGDON, and COTTON, solicitors, 10, King's Arms-yard, Moorgate-street; at St. Austell of Messrs. SHILSON, COODE, and CO., solicitors, and the auctioneers; at St. Columb of Mr. G. B. COLLINS, solicitor, at the place of sale; and at all the principal hotels in the county.—Dated this 19th day of March, 1864.

#### CORNWALL.

**IN the MATTER of the CORNUBIA TIN MINING COMPANY (LIMITED)**, and in the MATTER of the COMPANIES ACT, 1862.—TO BE SOLD, BY AUCTION, under authority of the liquidator appointed under the resolution passed for voluntarily winding-up the said company, by Messrs. HARDWICKS and BEST, of Leeds, at the Auction Mart, Bartholomew-lane, in the City of London, without reserve, on Thursday, the 7th day of April, 1864, at Twelve o'clock precisely, subject to such conditions as will be then and there produced, ALL that the INTEREST of the said COMPANY of and in a certain INDENTURE of GRANT, DEMISE, or MINING SETT, dated the 20th day of November, 1860, for the term of 21 years, by virtue of which the mining operations of the said company have for some time past been carried on at Roche, near St. Austell, in the county of Cornwall.

The mine may be inspected at any time prior to the sale, and further particulars obtained of Messrs. UPTON and YEWDALE, solicitors, Leeds, and 6, John-street, Bedford-row, London.

#### M. JOHN CHIESMAN WILL SELL, BY AUCTION,

at the Ball and Mouth Hotel, Leeds, on Tuesday, the 12th April next, at Two o'clock in the afternoon, an excellent WATER WHEEL, 34 ft. diameter, and quite new.—For further particulars, and order to inspect, apply to the Auctioneer, at his offices, Victoria Chambers, South Parade, Leeds.

#### ON THURSDAY NEXT.

**THE TAME VALLEY COLLIERY, on the MIDLAND RAILWAY, at WILNECOTE, near TAMWORTH, WARWICKSHIRE.**

**MESSRS. CHESSHIRE AND GIBSON** have received instructions BY AUCTION, on Thursday, the 7th day of April next (instead of the 14th, as previously advertised), unless in the meantime an acceptable offer be made by private contract, at the Union Inn, in Union-street, Birmingham, at Six o'clock in the evening for Half-past precisely, the VALUABLE LEASE, under which the above COLLIERY and MINES are held, together with the substantially-erected OFFICES and BUILDINGS, and the VALUABLE FIXED PLANT, put down within the last few years, at a very considerable cost.

The PLANT includes a pair of well constructed pit shafts, with their frames and gearing complete; THREE HORIZONTAL HIGH PRESSURE STEAM ENGINES, of 50, 12, and 10 horse power, with winding and pumping gearing; TWO 30 feet BOILERS, and ONE 22 ft. BOILER; iron tramways, connecting the colliery with the Midland Railway; also the tramways surrounding the pits, stables, and in the workings; 28 ft. gasometers, with retort and purifier; weighing machines, and other descriptions of fixed plant.

The mines and royalties are held upon very favourable conditions, under two leases, one including an area of 173 A. 2 R. 6 P., having 25 years unexpired on the 18th of Oct. 1864; and the other an area of 50 A. 2 R. 20 P., having 15 years unexpired on the 18th of Oct., 1864, with power of renewal for a further term of 10 years.

Full particulars as to the royalties and conditions, and further information, may be obtained on application to Mr. WILLIAM LOMAS HARRISON, accountant, Paradise-street; or Mr. KINNEAR, official assignee, Waterloo-street; or of Messrs. HODGSON and SON, solicitors, Waterloo-street; or of the auctioneers, Bennett's-hill, Birmingham, at whose offices copies of the leases and a plan of the property may be inspected.

N.B.—The colliery being now in full work, the whole or any portion of the unfixed plant may be taken by a purchaser at a fair valuation.

#### ON FRIDAY AND SATURDAY NEXT.

**UNRESERVED SALE AT THE TAME VALLEY COLLIERY AND BRICK WORKS, WILNECOTE, NEAR TAMWORTH, WARWICKSHIRE,** OF THE VALUABLE STEAM ENGINES AND BOILERS, MACHINERY, PLANT, AND EFFECTS.

(By direction of the Assignees of Messrs. Wood and Greenwood, bankrupts.)

**MESSRS. CHESSHIRE AND GIBSON** are instructed to SELL BY AUCTION on Friday and Saturday, the 8th and 9th days of April inst., commencing each morning punctually at Eleven o'clock, the whole of the VALUABLE PLANT and effects upon the above colliery, comprising three VALUABLE HIGH PRESSURE STEAM ENGINES, with their BOILERS, steam and exhaust pipes and seating pit, graining and frames, conductors, cages and tubes, capital winding bar and wire ropes, iron pump crank, with connecting rod, and 167 yards of pump rods and plates, 8 in. lift, 70 yards of 9 in. pipes, with 8 in. plunger, and 30 yards of 9 in. pipes, 8 in. barrels, and 45 yards of 5½ in. ditto, with 5½ in. rams, wrought iron cast-iron, &c. Circular saw bench, the contents of smiths' shops and carpenters' shops, and a quantity of valuable colliery stores of various descriptions, lifting jack, crab, and chains. Two 14 ton weighing machines, one 8 ton ditto, and one 1 ton ditto; about 5000 yards of wrought iron rails with chains, turn-outs, and sleepers. Also the office and other fixtures, eight capital geldings, entire horse, and four

APRIL 2, 1864.]

## THE MINING JOURNAL.

251

Tavistock Ironworks, Devon.—(Established 1804.)

**GILL AND CO., ENGINEERS AND IRONFOUNDERS,**  
MANUFACTURERS OF STEAM ENGINES AND BOILERS, CHAINS OF  
ALL DIMENSIONS, STEELED SHOVELS to any pattern. EVERY DESCRIPTION  
OF CAST and HAMMERED IRON for MINING, MANUFACTURING, and  
AGRICULTURAL PURPOSES.  
HAMMER MILLS, EDGE TOOL MANUFACTORY.  
FOREIGN MINES SUPPLIED ON LIBERAL TERMS.  
VARIOUS DESCRIPTIONS OF SECOND-HAND MACHINERY  
CONSTANTLY ON HAND.  
N.B.—AGENTS for TANGEY'S PATENT HYDRAULIC LIFTING JACK, and  
WESTON'S PATENT DIFFERENTIAL PULLEY BLOCKS.

**CLAYTON, SHUTTLEWORTH, AND CO.,**  
ENGINEERS,  
MANUFACTURERS of PORTABLE and FIXED STEAM ENGINES, MA-  
CHINERY for PUMPING, HOISTING, GRINDING, SAWING, &c., ENGINES for  
STEAM CULTIVATION, SELF MOVING ENGINES for COMMON ROADS  
and AGRICULTURAL PURPOSES GENERALLY.  
STAMP END WORKS, LINCOLN; and  
78, LOMBARD STREET, LONDON.

ALSO AT  
LOWENGASSE No. 41, LANDSTRASSE, VIENNA, and GEGENUBER DEM  
BAHNHOF, PESTH.  
Descriptive, illustrated, and priced catalogues free per post.  
SPECIAL DRAWINGS WHEN REQUIRED.  
THE BEST STEAM THRASHING MACHINERY MADE.

ESTABLISHED 1800.

**EDGE AND SON,**  
MANUFACTURERS OF  
IMPROVED FLAT and ROUND CHAINS and WIRE ROPES,  
FOR MINING PURPOSES.  
BOUKS, KIBBLES, BOILERS, IRON BLOCKS, and BLOCK CHAINS.  
RAILWAY COUPLINGS, HORSE TRACES, CRANE CHAINS,  
USES, and FORGINGS.  
MANUFACTORY, COALPORT, SHROPSHIRE.

Prize Medal Awarded Great Exhibition, 1851, for  
Mining Chains.

Prize Medal, International Exhibition, 1862.

**AVELING AND PORTER'S PATENT TRACTION**  
ENGINES AND LOCOMOTIVES FOR MINERAL RAILWAYS.  
For prices, illustrated description, and testimonials, apply to AVELING and PORTER,  
engineers, Rochester, Kent.

Exhibition Medal, 1862.

**WEIGHING MACHINERY,**  
CONSISTING OF  
PLATFORM WEIGHING MACHINES and HIND'S PATENT RAIL and ROAD  
WEIGHBRIDGES, overhead TRAVELLING WEIGHING CRANES and CRABS,  
RAILWAY WEIGHING TURNTABLES, &c.

CRANES

Of the WALL, PILLAR, PORTABLE, or TRAVELLING KINDS; and CRABS and  
WINCHES for STEAM or HAND POWER, &c. Also, TURNTABLES, WATER  
COLUMNS, TANKS, and PUMPING MACHINERY, and GENERAL RAILWAY  
PLANT, manufactured by

RICHARD KITCHIN, ENGINEER AND IRONFOUNDER,  
SCOTLAND BANK IRONWORKS, WARWICKTON.
Prize Medal Awarded Great Exhibition, 1851, and  
International Exhibition, 1862.

**PATENT SAFETY FUZE WORKS, TUCKINGMILL,**  
CORNWALL.—We beg respectfully to inform the public that since the decease  
of the late Mr. THOMAS DAVEY this firm has consisted of JOHN SOLOMON BICKFORD,  
GEORGE SMITH, FRANCIS PHYR, SIMON DAVEY, and WILLIAM BICKFORD SMITH. It is  
requested that all letters may be addressed, and all cheques and drafts made payable to  
BICKFORD, SMITH, AND CO.

**CHARLES DAVEY AND CO.,**  
SAFETY FUSE MANUFACTURERS,  
ST. HELEN'S JUNCTION, LANCASHIRE.

TO IRON AND COAL MASTERS, MINING AND QUARRY COMPANIES, &c.  
IMPROVED BLACK VARNISH.

FOR PREVENTING IRON FROM RUST, AND WOOD FROM DECAY.

**ABRILLIANT JET BLACK, SUPERIOR TO PAINT** in  
APPEARANCE, dries in less time, contains preservative qualities of the best  
description, and is economical in its use; one gallon, at £1, is equal to 14 lbs. of paint,  
which costs £4. For COLLIERY HEAD GEARING, RAILWAY WAGONS, BOILERS, CASTINGS,  
CANAL BOATS, &c., it is especially adapted. In casks containing 10, 15, and 20 cwt.  
each. In quantities of 1 ton and upwards, price £11 per ton.

TURPENTINE SUBSTITUTE.

GLOVER and Co. have now on hand really splendid painting samples of spirits of tur-  
pentine substitute, a pure crystal, not more volatile than the genuine American tur-  
pentine, and quite inoffensive to smell. Price, 2s. per gallon, in 30-gallon casks.

PETROLEUM.

This oil gives a pure, white, soft, and brilliant light, easily regulated, and portable.  
For works or public buildings, where gas is not desirable, the brilliancy and economy  
of the article are unequalled.

WASTE NO OIL.

STRONG IRON OIL CISTERNS.  
Not liable to leak, and which economise space in the stores. From 600 gallons, 48 dia-  
meter by 84 in height, price £10 10s., down to 10 gallons, 15 diameter by 21 in height,  
price 10s., WITH EVERY VARIETY OF SIZE AND PRICE BETWEEN.

STRONG IRON BUCKETS:

2½ gallons... 4s. 6d. | 3 gallons.... 5s. 0d. | 3½ gallons... 5s. 6d. | 4 gallons.... 6s. 0d.

WAGON GREASE.

GLOVER AND CO., No. 40, MANESTY LANE, LIVERPOOL.

**BASTIER'S PATENT CHAIN PUMP.**  
APPARATUS FOR RAISING WATER ECONOMICALLY, ESPECIALLY  
APPLICABLE TO ALL KINDS OF MINES, DRAINAGE, WELLS, MARINE,  
FIRE, &c.

J. U. BASTIER begs to call the attention of proprietors of mines, engineers, architects  
and the public in general, to his new pump, the cheapest and most efficient  
introduced to public notice. The principle of this new pump is simple and effective, and  
its action so arranged that accidental breakage is impossible. It occupies less space  
than any other kind of pump in use, does not interfere with the working of the shafts,  
and unites lightness with a degree of durability almost imperishable. By means of this  
hydraulic machine water can be raised economically from wells of any depth; it can be  
worked either by steam-engine or any other motive power, by quick or slow motion.  
The following statement presents some of the results obtained by this hydraulic machine,  
as daily demonstrated by use:—

1.—It utilises from 90 to 92 per cent. of the motive power.

2.—Its price and expense of installation is 75 per cent. less than the usual pumps em-  
ployed for mining purposes.

3.—It occupies a very small space.

4.—It raises water from any depth with the same facility and economy.

5.—It raises with the water, and without the slightest injury to the apparatus, sand,  
mud, wood, stone, and every object of a smaller diameter than its tube.

6.—It is easily removed, and requires no cleaning or attention.

A mining pump can be seen daily at work, at Wheal Concord Mine, South Sydenham,  
Devon, near Tavistock; and a shipping pump at Woodside Graving Dock Company  
(Limited), Birkenhead, near Liverpool.

J. U. BASTIER, sole manufacturer, will CONTRACT to ERECT his PATENT PUMP  
at HIS OWN EXPENSE, and will GUARANTEE IT FOR ONE YEAR, or will  
GRANT LICENCES to manufacturers, mining proprietors, and others, for the USE  
of his INVENTION.

OFFICES, 47, WARREN STREET, FITZROY SQUARE.  
London, March 21, 1859. Hours from Ten till Four. J. U. BASTIER, C.E.

THE MINING REVIEW, AND JOURNAL OF COMMERCE, TRADE AND  
MANUFACTURE, SCIENCE AND THE ARTS.

Published every Wednesday. Subscription, £1 1s. annually. Price 6d. stamped.

**RAILWAYS AND MINES.**

Railwayists who seek safe and profitable investments, free from risk, should act only  
upon the soundest information. The market prices for the day are for the most part go-  
verned by the immediate supply and demand, and the operations of speculators, without  
reference to the bona fide merits of the property. Railways depend upon the traffic, expen-  
iture, and capital accounts, the probabilities of alliance or competition with neighbouring  
companies, the creation of new shares, the state of the money market as affecting the re-  
newal of debentures, and other considerations founded on data to which those only can have  
access who give special attention to the subject. Mines afford a wider range for profit than  
any other public securities. The best are free from debt, have large reserves, and pay di-  
vidends bi-monthly varying from £15 to £25 per cent. per annum. Instances frequently  
occur of young mines rising in value 400 or 500 per cent. But this class of security,  
more than any other, should be purchased only upon the most reliable information. The  
undersigned devote special attention to railways and mines, afford every information to  
capitalists, and effect purchases and sales upon the best possible terms. Thirty years'  
experience in mining pursuits justifies us in offering our advice to the uninformed in se-  
lecting mines for investment; we will, therefore, forward, upon receipt of Post-office  
order for 5s., the names of six dividend and six progressive companies that will, in our  
opinion, well repay capitalists for money employed.

Messrs. TREDDINICK AND CO., STOCK and SHAREBROKERS, and DEALERS  
IN BRITISH MINING SHARES, 78, LOMBARD STREET, E.C.

**THE NEWCASTLE CHRONICLE AND NORTHERN**  
COUNTIES ADVERTISER. (ESTABLISHED 1764).

Published every Saturday, price 2d., or quarterly 2s. 2d.

**THE DAILY CHRONICLE AND NORTHERN COUNTIES ADVERTISER.**

Published every morning, price 1d.

Offices, 42, Grey-street, Newcastle-upon-Tyne; 50, Howard-street, North Shields;

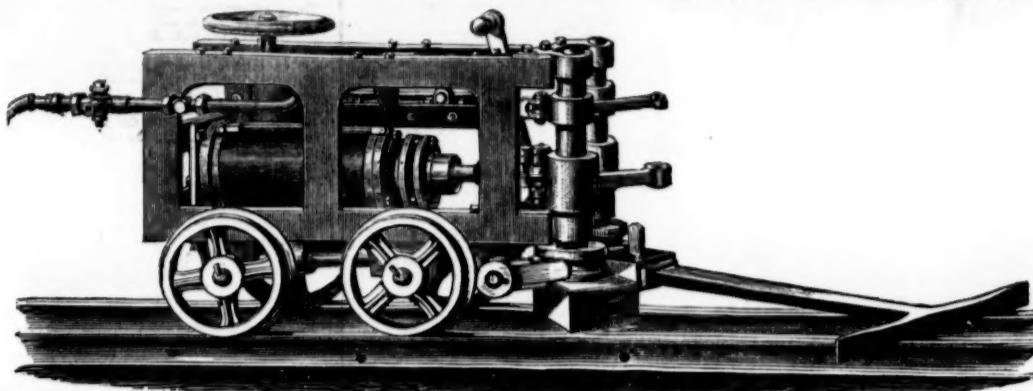
195, High-street, Sunderland.

**READ THE NEW MEDICAL GUIDE,** written by a Physician,

for the Self Cure of Nervousness, Indigestion, Loss of Memory, Dimness of Sight,  
Lassitude, &c. This work is illustrated with hundreds of cases and testimonials from  
patients, showing the treatment by which they were cured. Free by post to any ad-  
dress, on receipt of a stamped directed envelope.—Address to Messrs. SMITH, 8, Burton-  
ware, Tavistock-square London, W.C.

## THE MINING JOURNAL.

## COAL CUTTING BY MACHINERY.

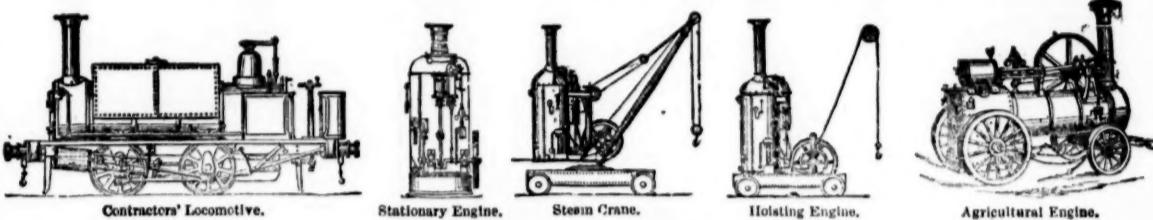


**MESSRS. RIDLEY AND JONES** have, by recently PATENTED IMPROVEMENTS, COMPLETED their TRUNK COAL CUTTING MACHINE, WORKED by COMPRESSED AIR, and are NOW PREPARED to NEGOCIATE for the USE, and to SUPPLY MACHINES, which will be found to COMBINE SIMPLICITY of CONSTRUCTION with PORTABILITY and ECONOMY in WORKING. By the use of these machines a CONSIDERABLE SAVING of COAL is EFFECTED, and the COST of LABOUR MUCH REDUCED. Each machine will be guaranteed as to its capabilities, &c.

All applications to be made to Messrs. RIDLEY and JONES, No. 11, South-street, Finsbury, London, E.C.

\*\* COLLIERY PROPRIETORS are CAUTIONED against PURCHASING or USING MACHINES, the construction of which will constitute an INFRINGEMENT of the ABOVE PATENT.

## NEW PATENT PORTABLE STEAM ENGINES AND BOILERS.



These engines REQUIRE NO CHIMNEY SHAFT nor BUILDING WHATEVER, a cast-iron ash-pit forming the sole-plate, and they may be set up anywhere and started at once.

	Prices of engines and boilers complete, delivered free in Glasgow, Hull, Liverpool, or London.	£125
1 horse power, cylinder 3½ in. x 6½ in. stroke	£45	7
2 " " 4½ " x 9 "	65	" 150
3 " " 5½ " x 11 "	85	" 180
4 " " 6½ " x 13 "	105	" 210

Prices of STEAM CRANES, HOISTING ENGINES, CONTRACTORS' LOCOMOTIVES, AGRICULTURAL, PUMPING, and OTHER ENGINES on application.

J. B. BROWN AND CO., 18, CANNON STREET, CITY, LONDON, E.C.

International Exhibition, 1862—Prize Medal.

**JAMES RUSSELL AND SONS** (the original patentees and first makers of wrought-iron tubes, of the CROWN PATENT TUBE WORKS, WEDNESBURY, STAFFORDSHIRE, have been AWARDED a PRIZE MEDAL for the "good work" displayed in their wrought-iron tubes and fittings.

Warehouse, 81, Upper Ground-street, London, S.

Prize Medal, International Exhibition, 1862.

**RUSTON, PROCTOR, AND CO.'S CELEBRATED** PRIZE PORTABLE ENGINES are SPECIALLY ADAPTED for WINDING, PUMPING, SAWING, &c. These engines have, in public competition, won the highest honours. For ECONOMY in WORKING, LARGE ALLOWANCE of POWER in CYLINDER AREA and PROPORTIONATE SIZE of BOILER, STRENGTH OF CONSTRUCTION, HIGH FINISH, and GENERAL EFFICIENCY, they are unrivalled, having recently been AWARDED THIRTEEN GOLD, SILVER, and BRONZE PRIZE MEDALS, And numerous other prizes.

Messrs. A. KNOWLES and Sons write:—

Pendlebury Colliery, near Manchester, June 5, 1861.  
GENTLEMEN.—We beg to inform you that we have now in use the portable engine of 8 horse power you supplied us with, and have great pleasure in informing you that it works well, and we are much pleased with the workmanship and finish of it.

We are, yours respectfully, ANDREW KNOWLES AND SONS.

Illustrated, descriptive, and priced catalogues may be had on application to the Shear Ironworks, Lincoln.

Prize Medal—International Exhibition, 1862



## CHAPLIN'S PATENT PORTABLE STEAM ENGINES, &amp;c., for PUMPING AND WINDING.

These engines are SPECIALLY ADAPTED for PITS, QUARRIES &c. They are EXCEEDINGLY SIMPLE in ARRANGEMENT, and STRONG. NO FOUNDATION or CHIMNEY STALK being NECESSARY, they can be ERECTED or REMOVED with VERY LITTLE TROUBLE or EXPENSE, and are WELL ADAPTED for HOME or FOREIGN USE.

Sizes, from 2 to 25 horse power.

STEAM CRANES, STEAM WINCHES, CONTRACTORS'

LOCOMOTIVES, HOISTING ENGINES, PUMPING

AND WINDING GEARING, &c.

ALEXANDER CHAPLIN AND CO.,

CRASTONHILL ENGINE WORKS, GLASGOW.

OFFICES, 9, ADAM STREET, ADEPHI, LONDON, W.C.

DEPOT, LOWER FORE STREET, LAMBETH, S.

(Near the steamboat pier.)

**CREASE'S PATENT EXCAVATING MACHINERY,** for SUPERSEDING the SLOW and EXPENSIVE USE of MANUAL LABOUR in SINKING SHAFTS, DRIVING LEVELS, TUNNELLING, &c., is guaranteed to drive through any rock of average hardness at a minimum rate of 1 fm. per diem, and to sink shafts at the rate of 2 fm. in three days.

Mr. CREASE will undertake contracts for sinking shafts, driving levels, &c., at an enormous reduction of time and great saving in cost.

Applications to be addressed (for the present) to the patentee, Mr. E. S. CREASE, Tavistock, Devon.

By providing the power of calculating the time and cost to explore a certain depth and extent of ground, speculation in mining will be assimilated to commercial pursuits, with this unmistakable advantage—that when the ground has been once carefully and judiciously selected, and operation properly and systematically carried out for its development, there would be far less chance of unsatisfactory results than are met with by merchants and manufacturers in the usual routine of their business. As this important invention must beneficially interest the landowners, mine proprietors, merchants, and miners, we hope it will meet with immediate adoption.—*Mining Journal.*

Read extracts of testimonials, apply to—

## THOMAS TURTON AND SONS.

MANUFACTURERS OF  
CAST STEEL for PUNCHES, TAPS, and DIES,  
TURNING TOOLS, CHISELS, &c.

## THE MINING SHARE LIST

## BRITISH DIVIDEND MINES.

Shares.	Mines.	Paid.	Last Pr.	Business.	Dividends Per Share.	Last paid
1200 Alderley Edge (cop.), Cheshire [L.]	10 0 0 ..	..	..	9 12 0 ..	0 15 0 -Feb.	1864
4500 Bedford United (copper), Tavistock	2 6 8 ..	..	..	13 4 0 ..	0 2 0 -Jan.	1864
1245 Boscastle (tin, copper), St. Just	6 15 0 ..	..	..	1 0 0 ..	0 5 0 -Feb.	1864
200 Botallack (tin, copper), St. Just	91 5 0 ..	..	..	474 15 0 ..	0 5 0 -Feb.	1864
5000 Bronfydd (lead), Cardigan [L. £1]	2 7 6 ..	..	..	0 16 0 ..	0 2 6 -Jan.	1864
916 Cargill (silver-lead), Newlyn	15 5 7 ..	38 ..	38 40 ..	7 5 0 ..	1 5 0 -Feb.	1864
2900 Clifford Amalgamated (cop.), Gwen	30 0 0 ..	38 1/2 ..	38 1/2 ..	30 18 0 ..	0 10 0 -Feb.	1864
12000 Copper Miners of England	25 0 0 ..	..	..	7 1/2 per cent.	-Half-yearly.	
4000 Ditto ditto (stock)	100 0 0 ..	..	..	7 1/2 per cent.	-Half-yearly.	
857 Cwm Erbin (lead) Cardiganshire [L.]	7 10 0 ..	..	..	10 15 0 ..	0 15 0 -Jan.	1864
1238 Cwmystwyth (lead), Cardiganshire [S.E.]	60 0 0 ..	..	..	259 10 0 ..	0 4 0 -Nov.	1863
1224 Devon Gt. Con. (cop.), Tavistock [S.E.]	6 0 0 ..	..	..	901 0 ..	0 10 0 -Mar.	1864
5000 Dolcoath (copper, tin), Camborne	128 17 6 ..	..	..	182 0 ..	0 10 0 -Mar.	1864
12800 Drake Walls (tin, copper), Calstock	2 1 0 ..	39 ..	38 40 ..	748 10 0 ..	0 8 0 -Feb.	1864
513 East Bassett (cop.), Redruth [S.E.]	20 0 0 ..	72 1/2 ..	68 70 ..	119 0 ..	0 2 0 -Mar.	1864
6144 East Caradon (copper), St. Cleer [S.E.]	2 14 6 ..	32 ..	32 32 1/2 ..	9 2 0 ..	0 19 0 -Jan.	1864
300 East Darren (lead), Cardiganshire	32 0 0 ..	..	..	93 10 0 ..	0 2 0 -Feb.	1864
1228 East Pool (tin, copper), Pool, Illogan	24 8 0 ..	..	..	357 10 0 ..	7 10 0 -Feb.	1864
1906 East Wheal Lovell (tin), Wendron	2 18 6 ..	10 ..	11 1/2 12 ..	1 0 0 ..	7 6 -Jan.	1864
2800 Foxdale (lead) Isle of Man [L.]	25 0 0 ..	..	..	62 0 ..	0 1 0 -Sept.	1863
5000 Frank Mills (lead), Christow	3 18 6 ..	..	..	1 0 0 ..	0 3 0 -Feb.	1864
12500 Great Laxey (lead), Isle of Man [L.]	4 0 0 ..	6 ..	5 1/2 5% ..	0 6 0 ..	0 6 0 -Mar.	1864
1790 Great Wheal Fortune (tin), Breage	18 6 0 ..	17 ..	15 1/2 16 1/2 ..	5 18 0 ..	0 10 0 -Nov.	1863
8900 Great Wh. Vor (tin, cop.), Helston [S.E.]	40 0 0 ..	35 ..	37 38 ..	3 7 0 ..	0 10 0 -Mar.	1864
119 Great Work (tin), Germoe	100 0 0 ..	..	..	5 0 0 ..	0 8 0 -Feb.	1864
1224 Herodsfoot (id.), near Liskeard [S.E.]	10 0 0 ..	..	..	28 0 0 ..	1 15 0 -Feb.	1864
400 Liblorne (lead), Cardiganshire, Wales	15 15 0 ..	..	..	415 10 0 ..	0 3 0 -Dec.	1863
9000 Marke Valley (copper), Caradon	4 10 6 ..	6 1/2 ..	5 1/2 6 ..	2 12 0 ..	0 1 0 -Jan.	1864
1800 Miners Mining Co. [L.] (id.), Wrexham	20 0 0 ..	..	..	135 18 0 ..	0 7 0 -Feb.	1864
20000 Mining Co. of Ireland (cop.), Head, coal	7 0 0 ..	..	..	15 7 0 ..	0 9 0 -July.	1863
40000 Mwyrdy (iron ore) [L. £1] [S.E.]	2 10 0 ..	..	..	0 2 0 ..	0 2 0 -Mar.	1862
250 Nanty Miners (lead), Montgomery	20 0 0 ..	..	..	6 0 0 ..	1 0 0 -Mar.	1864
6000 New Birth Tor and Yllifor Cons. (tin)	1 6 6 ..	..	..	0 5 6 ..	0 2 0 -Sept.	1863
9230 North Treskerby (copper), St. Agnes	1 9 0 ..	3 1/2 ..	0 13 0 ..	0 13 0 ..	0 2 0 -Feb.	1864
6400 Par Consols (cop.), St. Blazey [S.E.]	1 2 6 ..	..	..	36 19 0 ..	0 2 0 -Mar.	1863
500 Parrys Mines (copper), Anglesey [L.]	50 0 0 ..	..	..	9210 0 ..	0 10 0 -Jan.	1864
1772 Polberro (tin), St. Agnes	15 0 0 ..	..	..	7 19 0 ..	0 10 0 -Nov.	1863
512 Poibren (tin), St. Agnes	8 0 0 ..	..	..	1 0 0 ..	0 1 0 -July.	1863
1123 Providence (tin), Uny Lelant [S.E.]	10 6 7 ..	43 ..	42 42 ..	72 5 0 ..	1 5 0 -Feb.	1864
6000 Rosewall Hill and Ransom United	2 16 0 ..	..	..	10 0 0 ..	0 1 0 -June.	1863
512 South Caradon (cop.), St. Cleer [S.E.]	1 5 0 ..	485 ..	455 455 ..	432 10 0 ..	0 6 0 -Mar.	1864
512 South Tolgus (cop.), Rethruth, Cornwall	8 0 0 ..	43 ..	40 43 ..	74 10 0 ..	1 0 0 -May.	1863
500 S. Wh. Frances (cop.), Illogan [S.E.]	18 18 9 ..	..	..	370 13 6 ..	1 0 0 -Nov.	1863
4000 St. Day United (tin), Redruth	14 0 0 ..	10 ..	9 1/2 10 ..	0 5 0 ..	0 5 0 -Mar.	1864
940 St. Ives Consols (tin), St. Ives	8 0 0 ..	..	..	48 10 0 ..	1 0 0 -Feb.	1864
8000 Tincroft (cop.), Pool, Illogan [S.E.]	9 0 0 ..	20 ..	19 20 ..	14 8 0 ..	0 10 0 -Mar.	1864
4200 Vigras and Cloughau (cop.) [L. £1]	4 0 0 ..	39 ..	..	5 8 0 ..	1 15 0 -Mar.	1864
6000 West Bassett (copper), Illogan [S.E.]	1 10 0 ..	..	..	25 3 0 ..	0 5 0 -Mar.	1864
256 West Damsel (copper), Gwennap	38 10 0 ..	..	..	48 0 0 ..	1 0 0 -Jan.	1864
4000 W. Wh. Seton (cop.), Camborne [S.E.]	47 10 0 ..	225 ..	205 210 ..	401 0 ..	0 4 0 -Feb.	1864
512 Wheal Bassett (copper), Illogan [S.E.]	5 2 8 0 ..	90 ..	85 90 ..	597 0 ..	0 1 0 -Feb.	1864
1000 Wheal Bassett and Grylls (tin)	7 0 0 ..	18 ..	..	3 0 0 ..	0 10 0 -Oct.	1863
1024 Wheal Grylls (tin), Perranuthnoe	2 4 0 ..	..	..	6 2 0 ..	1 0 0 -Sept.	1863
512 Wheal Jann (silver-lead), Ken	3 10 0 ..	..	..	14 0 0 ..	1 0 0 -Mar.	1864
4296 Wheal Kitty (tin), St. Agnes	5 4 6 ..	7 1/2 ..	7 1/2 8 ..	1 8 0 ..	0 5 0 -Jan.	1864
1024 Wheal Kitty (tin), Uny Lelant [S.E.]	2 0 6 ..	..	..	76 5 0 ..	1 0 0 -Mar.	1863
896 Wh. Margaret (tin), Uny Lel. [S.E.]	9 17 6 ..	19 ..	..	67 17 6 ..	0 10 0 -Mar.	1862
1024 Wh. Mary Ann (id.), Menheniot [S.E.]	8 0 0 ..	14 ..	12 1/2 13 1/2 ..	57 17 6 ..	0 10 0 -Mar.	1862
100 Wheal Owles (tin), St. Just, Cornwall	70 0 0 ..	..	..	338 8 0 ..	5 0 0 -Feb.	1864
396 Whel Seton (tin, copper), Camborne	58 10 0 ..	197 1/2 ..	195 200 ..	166 15 0 ..	4 0 0 -Feb.	1864
1040 Wh. Trellawny (sl.-id.), Liskeard [S.E.]	5 17 0 ..	24 ..	23 24 ..	49 0 0 ..	0 15 0 -Feb.	1864
2044 Whel Trellawny (tin), Gwinear	6 11 3 ..	..	..	0 15 0 ..	0 8 0 -Nov.	1863
7060 Wicklow (copper) [L.]	21 0 0 ..	..	..	14 5 0 ..	1 6 0 -Aug.	1862

[\* Dividends paid every two months. † Dividends paid every three months.]

## BRITISH MINES WITH DIVIDENDS IN ABEYANCE.

240 Boscaen (tin), St. Just	20 10 0 ..	..	..	36 10 0 ..	1 0 0 -Mar.	1862
1000 Carn Brea (copper, tin), Illogan	15 0 0 ..	..	..	278 10 0 ..	2 0 0 -Feb.	1862
5000 Chiverton (lead), Perranuthnoe [S.E.]	5 0 0 ..	13 ..	12 1/2 13 ..	..	..	
256 Condurrow (cop.), Camborne	35 0 0 ..	100 ..	..	85 0 0 ..	2 0 0 -June.	1857
245 Cook's Kitchen (copper), Illogan	17 15 9 ..	21 ..	..	1 7 0 0 ..	0 7 0 -May.	1862
1024 Copper Hill (copper), Redruth	12 0 0 ..	18 ..	12 13 ..	2 7 8 ..	..	
1055 Craddock Moor (copper), St. Cleer	8 0 0 ..	..	..	7 12 0 ..	0 4 0 -July.	1862
280 Derwent Mines (sl.-lead), Durham	300 0 0 ..	..	..	147 0 ..	0 5 0 -June.	1862
4076 Devon and Cornwall (cop.), Tavistock	5 16 5 ..	..	..	0 10 0 ..	0 2 0 -Feb.	1862
8000 Dwyngwm (lead), Wales	12 0 6 ..	..	..	0 17 0 ..	0 2 0 -Jan.	1863
940 Fowey Consols (copper), Trewardreath	4 0 0 ..	..	..	41 9 3 ..	0 2 0 -June.	1860
6000 Great South Tolgus (Tol., E. Redruth)	14 0 14 ..	..	3 2 1/2 ..	7 18 0 ..	0 5 0 -Dec.	1861
1024 Gunnis Lake (Gillifers' Adit)	6 2 6 ..	..	..	0 3 0 ..	0 1 0 -Mar.	1862
160 Levant (copper, tin), St. Just	21 0 0 ..	..	..	1091 0 ..	0 5 0 -May.	1860
640 Mount Pleasant (lead), Mold	4 0 0 ..	..	..	18 18 0 ..	1 0 0 -Aug.	1862
5000 Orsedd (lead), Flintshire	0 0 8 ..	..	..	0 10 4 ..	0 8 0 -Mar.	1862
512 Wheal Jane (silver-lead), Ken	3 10 0 ..	..	..	14 0 0 ..	0 10 0 -Mar.	1864
4296 Wheal Kitty (tin), Uny Lelant [S.E.]	5 4 6 ..	..	..	76 5 0 ..	1 0 0 -Mar.	1863
1024 Wheal Kitty (tin), Uny Lelant [S.E.]	19 17 6 ..	19 ..	..	76 5 0 ..	1 0 0 -Mar.	1864
896 Wh. Margaret (tin), Uny Lel. [S.E.]	9 17 6 ..	19 ..	..	76 5 0 ..	1	